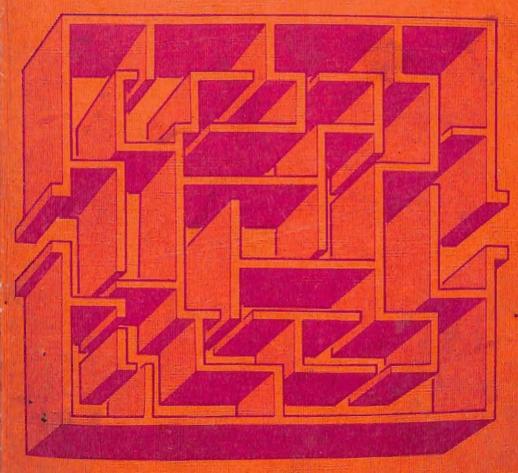
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programmes and progress

edited and introduced by Paul Widlake



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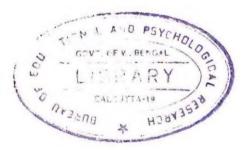
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Remedial Education: programmes and progress

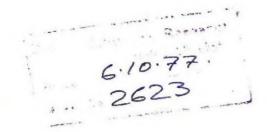
A reader edited and introduced by Paul Widlake for the National Association for Remedial Education from the journal Remedial Education

National Association for Remedial Education Central Office 4, Oldcroft Road Walton-on-the-Hill Stafford









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The National Association for Remedial Education

promotes the exchange of ideas and discussion of methods and developments in remedial work.

It promotes national and regional courses and conferences.

It promotes the status of those working in remedial education.

It encourages the formation of local groups and activities.

It initiates research relevant to remedial work.

NARE publishes an internationally distributed journal:

Remedial Education

seeks to present practical information and research findings over the whole range of learning disability likely to be experienced by children whose handicap is not so severe as to exclude them from the ordinary school system. The whole curriculum is covered but there is a particular interest in the teaching of the basic subjects and particularly of literacy in all its aspects, which includes a consideration of children's imaginative literature and the publication of appropriate book-lists. Most issues contain a section on non-Englishspeaking children and a feature for teachers-in-training. Relevant contributions from educational technology are reported. The journal should be of interest to teachers of primary and secondary children and of adult illiterates, to psychologists and reading specialists, and to others whose work bears upon the nature and treatment of educational malfunction.

Contents

Notes on the contributors	viii
Overview	xii
	1
Section 1 What is remedial education? 1 Case history of a backward child (4.1,1969)	3
Michael Newby What is remedial education? (3.2,1968)	7
R. C. Ablewhite	15
 3 Specialization for all (8.1,1973) Gerald F. Platt 4 Change in remedial education (5.1,1970) 	21
P. D. PumfreyReading standards in educational priority areas	25
(8.2,1973) A. H. Halsey et al 6 Teaching a special class in an ordinary school	39
(4.1,1969) P. S. Roseblade 7 Parental involvement schemes (9.3,1974) R. A. Broome	46
Section II The organization of remedial education services 8 Remedial Education talks to Philip Williams	58 60
(3.3/4,1968) 9 A policy for remedial education (6.1,1971)	71
W. K. Brennan 10 Broadening the role of remedial teachers (4.1,1969)	83
Edwin Mason	
Section III Evaluation of remedial education	89 90
11 The remedial teaching of reading: an evaluation	,
(7.1,1972) H. C. M. Carroll Results of a reading 'drive' (7.1,1972) Paul Widlake	103

Section IV Early intervention	112				
3 Language and learning in the pre-school (6.2,1971) 1 Paul Widlake					
	121				
Section V Remedial education in primary schools	128				
15 Remedial approaches: three articles (4.3,1969) Howel Jones	129				
16 Remedial teaching in primary schools (3.2,1968) R. S. Pope	140				
Section VI Remedial education in secondary schools	153				
Section vi Remediat cancata in Section in Section	154				
18 Westfield School: the slow learner department (7.3,1972) Sylvia Blackburn	164				
19 The role of the remedial department in a comprehensive school (4.2,1969) K. Williams	170				
20 An oral approach to remedial English (7.3,1972) Sinclair Rogers	177				
21 A diagnostic approach to teaching reading to young adolescents (8.3,1973) Desmond Swan	184				
*					
Section VII Materials and resources for remedial education	192				
22 Concept 7-9 (8.1,1973) John Worsley	193				
23 Use of the oscilloscope to solve a particular reading problem (8.1,1973) Christopher Dyer	197				
24 The use of an audio-visual reading programme (7.2,1972) Neil Brown	201				
25 Using a television programme to stimulate	206				
26 Television programmes in a school remedial reading scheme (4.1,1969) Betty Dunning	210				

 27 The use of comics in remedial teaching (7.1,1972) Terry D. Johnson and R. Johnson 28 A local radio series for slow learning children (8.2,1973) R. D. Valentine and D. R. K. Quayle 	216 222
Section VIII Remedial education in the school curriculum 29 Teaching science to slow learners in secondary schools (7.1,1972) Michael Hinson	227 229
30 Teaching science to slow learners (7.2,1972)	235
John Nettleship 31 The place of environmental studies in remedial work with older pupils (8.3,1973) L. H. Bolwell	240
and C. J. Lines 32 The musical potential of less able children	247
(3.2,1968) Geoffrey Higgs	252
33 Poetry in remedial classes (2.2,1967) John Gregory34 Diagnosing difficulties in number (8.2,1973)	258
Norman Cawley 35 Evaluation of new materials (8.1,1973) An evaluation of an approach to history for remedial pupils. A. Simon and L. O. Ward	265
Section IX Specific learning disabilities and their treatment	t 276
30 A revision of the Swansea Test of Phonic Skills	277
(8.3,1973) Peter Congdon 37 Auditory problems and remediation (8.2,1973)	284
Doris Partan 38 Dyslexia: some practical needs (4.1,1969)	292
T. R. Miles 39 Dyslexia: Response to Professor Miles;	298
dyslexia and I (4.3,1969) M. J. N. Newby	302
40 Decoding for dyslexia (5.2,1970) Lyn Wendon	309
41 The teaching of spelling (5.2,1970)	307
Margaret Peters 42 Teaching left-handed children (5.2,1970)	316

Margaret M. Clark

43 The remedial teacher and the immigrant child	32		
(6.1,1971) Joti Bhatnagar	33		
44 A class for adult illiterates (8.2,1973)			
Alan Livingstone			
Section X Remedial education in action	33		
45 A case of severe learning disability (7.1,1972) Gill Cotterell	33		
46 Michael, Robert, John and Marc (7.2,1972)	34		
Gill Cotterell and Margaret Newton			
· ·	20		
NARE: the first ten years	36		
Roy Bushell			

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Overview

The present volume contains articles published in the journal Remedial Education during the decade 1964-74, with the emphasis fairly heavily on the last five years. Inevitably, many contributions have had to be omitted; some for the obvious reason that they were controversial and have now influenced development in such a way that they seem out of date - a desirable fate for pioneering journalists; others, because the topic to which they addressed themselves has been covered in another article. I should like to take this opportunity of thanking the authors who have contributed to our journal during these years. It has, unfortunately, not proved possible to contact every author individually in connection with the present volume, and to those who have not so heard, I should like to send a special greeting in return for their assumed compliance. No one has received a fee, and none of those, represented in the present volume will do so; any moneys received in royalties will be ploughed back into the cause via the National Association for Remedial Education.

Only articles which seemed to have an enduring interest have been reprinted, so, for the most part it has not been the policy to ask authors to update their contributions. The present volume can stand as a record of the endeavours of those working with educationally handicapped children in Britain in the sixties and early seventies. The sincerity of all concerned can hardly be doubted. That there was a case for gathering such a collected edition has been made apparent by a continual stream of requests for offprints and back numbers from readers who have been kind enough to comment favourably on the blend of the practical and theoretical contained in *Remedial Education*. The aim has been to produce a useful work of reference, but also to reflect adequately the enthusiasm and skill of remedial teachers.

Many of the articles have been written in the aftermath of

successful teaching, and convey a sense of achievement akin to that given by good craftsmen in other spheres (for example, Hinson 29, p.229 and Nettleship 30, p.235 on science teaching; Gregory on poetry 33, p.252; Gill Cotterell 45, p.337 on severe reading disability).

In Section I problems of definition are considered, though it cannot be claimed that they are resolved. It becomes clear that remedial teachers have many different and perhaps conflicting perceptions of their role. No one will doubt that they subscribe to Socrates' view: the unexamined life is not worth living. These contributors actively examine the work they are asked to do, and are by no means content to ignore the wider connotations of their jobs. If there is one big blooming confusion in remedial education (as, according to James, in the early stages of the infant's development), Section II shows that it is not so much the individual teacher who is at fault as the Local Education Authority, reflecting the even greater confusion of a society lacking a homogeneous view of the treatment of its handicapped members. It is not surprising, given this amount of ad hocery, that evaluations of remedial education (Section III) tend to yield rather disappointing results. My own investigations, plus twenty years' involvement, has convinced me that most cases of learning disability can be alleviated; and that improvements can be sustained if the right kind of learning environment is provided over a long period of time. It may be that remedial educationists have themselves fostered the myth that there is some kind of magic serum - an educational equivalent to penicillin - which will cure after a short series of injections. Not so, as Carroll's (11, pp.90) review of the facts amply indicates. But there are equally ample records of good teaching and its encouraging results (Section X). Such teaching requires follow-up and we must get round to thinking in periods of years of total treatment, away from the old image of this kind of education as predominantly concerned with 'under achieving', very bright children who might reasonably be expected to respond quickly (and who just as quickly lose their learning increment once the support of their specialist teacher is withdrawn). Obviously, the sooner such treatment begins the better

(Section IV); and the more we think in terms of prevention rather than patching-up, the better we shall all be. However, the effects of early intervention programmes have yet to be demonstrated unequivocally; one can be optimistic about the educational potential of these programmes, while recognising that in the past all such innovations have been of most benefit to middle-class children, and that at present, as in the past, educational policies in Britain are least favourable to those in greatest need.

Remedial teachers are nothing if not practical, and the present volume is rich in specifics. Section VI also contains a wide-ranging consideration of the nature of special educational provision at secondary level (Smedley 17, p.154).

It is here that the problems are most horrendous, if only because fourteen-year-old non-readers are larger and potentially more dangerous than the same person at seven. They do not spring fully grown like Pallas Athene from the head of Zeus, though many teachers and employers talk as if they did. No one in his right mind would talk about solutions for these problems; but the discussions in this section show competent professionals at work on very difficult tasks, and some successes

have certainly been chalked up.

The core of the volume is contained in Sections VII to IX. Right or wrong, this is where most of the energy has been expended: on materials and resources, curriculum developments and their evaluation and on the assessment and treatment of specific learning disabilities. The scope is impressive. Modern technology has received a most enthusiastic welcome among remedial education specialists and good use has been made of TV, tape recorders and radio; of ordinary humdrum typewriters and also of the £16,000 computer-based Talking Typewriter and the sophisticated 'Sight and Sound' learning system; of computers at one end of the spectrum and comics and games at the other. Variety has certainly to be the spice of the remedial teacher's life.

Most aspects of the curriculum are represented. Science, environmental studies, history, music, poetry and mathematics have all been taught with success to children with severe educational handicaps. Perhaps it is not so hard after all: in this sort of teaching it is true that 'there's nothing good or bad but thinking makes it so'. And we know so much about how it's done, and about all kinds of specific learning difficulties such as dyslexia, dysgraphia, spelling, left-handedness. language disorders. Of course, there is much that remains to be investigated, but at a purely practical level, it can be asserted that we have techniques suited to most of the disabilities likely to be met in the ordinary school classroom.

In spite of this relatively advanced pedagogy, very large numbers of boys and girls remain effectively illiterate (Halsey et al. 5, p.25). They manage to pass right through the State educational system without learning to read; yet many are still willing and eager to receive instruction as adults (Livingstone 44, p.332). This should leave us, as teachers, at once humble and hopeful.

Looking ahead

It can be predicted that the next decade will see articles in Remedial Education which concentrate more than in the past on the social aspects of educational handicap. It seems certain that the role of the community school will have to be examined and will be an important element in the policies of most LEAs during the late 1970s. Failing pupils are not necessarily helped by far-reaching organizational changes, such as, to take a few examples at random, Open Plan schools, de-streaming, computer-assisted individualised learning programmes, faculty instead of departmental curriculum perspectives. Exactly how we can make provision for the individual failing child in these new circumstances must be worked out and in a school rather than a clinical setting. This is not to suggest that we should abandon hard won 'ideographic insights'; but the balance between this view of learning disability and the 'nomothetic' has been too greatly weighted in favour of the former despite writers like Smedley (17, p.154) and Mason (10, p.83). We should, perhaps, expect to hear more about the radical alternatives. Those who claim to be concerned about the fate of failing children cannot be unconcerned about the fate of the failing British Society; about the success and effectiveness of those who practise violence and intimidation, and the consequences for democratic forms of society; about the claims of the young for freedom and the obvious duty of caring adults to protect them from unscrupulous exploitation. In short, a journal focused on educational handicap must record street corner society in all its complexity, and not ignore rural poverty either. Phonics may be fun (we have techniques to make you enjoy yourself), but reading is something else. The educated middle class has no monopoly on wisdom, but teachers sometimes act as if they had when they take their goodies to the 'culturally deprived'. Brecht warned us:

Beware of willing Judges
For Truth is a black cat
In a windowless room at midnight
And Justice a blind bat!

Paul Widlake

What is remedial education?

Some of the articles in this section offer an operational definition of the teacher's role in response to this key question; others address themselves to a consideration of policies in the broadest sense. This is perhaps a fair reflection of the movement of opinion over the last decade among those professionally concerned with the plight of educationally handicapped children.

In the early 1960s it was possible to consider remedial education almost exclusively in psychological terms. The inspiration for much of the successful work would be traced to pioneer psychologists such as Sir Cyril Burt and Sir Fred Schonell; the university courses which have produced most of the 'middle management' personnel have been deeply influenced by psychologists. It is only recently that the treatment of individual learning problems has been seen in a sociological perspective. The full impact of these insights has yet to be felt in Britain but considerable contributions have been made recently by the Government report Children and their Primary Schools (the Plowden Report), the action research project which has produced Educational Priority (Vols. 1 to 5; ed. A. H. Halsey); and the Bullock report A Language for Life.

The memorandum reproduced here (Halsey et al, 5 p.25) offers a dramatic account of the effects of multiple deprivation on a school population; these children were not, for the most part, mentally handicapped, but in respect of their achievements in school subjects they were educationally subnormal. However one deploys such terminology, it is clear that educational techniques which offer some hope of success cannot be based on definitions which view the child as if he

Remedial education: programmes and progress

were living in a social vacuum. It is necessary to involve parents as much as possible, in roles which will help to break down barriers and reduce areas of misunderstanding between them and their children's teachers; Broome (7 p.46) offers a useful resumé of techniques. It is necessary to persuade specialist teachers that their main contribution should be in the classroom, not in the clinic (Platt, 3, p.15; Pumfrey, 4, p.21; Roseblade, 6, p.39); and it is no accident that the volume has, as its first contribution, a statement by a qualified teacher who has seen the problems at grass roots level, who had no possibility of evading them and no desire to do so, but would dearly like others to be given more help in learning how to cope.

Remedial education, it begins to appear, is concerned with the identification of educational needs wherever they appear and with the provision of relevant educational programmes.

1 Case history of a backward child Michael Newby

My first realization that I was having difficulty with work at school, was when I found I could not understand my tables. I thereafter discovered, by sneaking glances at the written work of my fellows, that my writing was the worst in the class. In fact it was almost totally unreadable even by me, but up to then I had accepted my own work as the norm. I also found I was the only one in the class who did not know his A B C. I also muddled left and right.

There were reasons for this: schooling interrupted by evacuation; the horrific bombing I experienced, which had as a climax the day I was caught out in the open during a raid; and a background of quarrelling at home. I now, however, learnt to hate school. War to me was invented by grown-ups. Evacuation was rejection by my own family. The day I ran alone through the streets looking for safety, but finding only bombs and bullets, was the day I felt all grown-ups had declared war personally on me. School became the very essence of all that was hateful. I encouraged real illness where possible, and invented illness whenever I could. I lied, cheated and withdrew from class work on every possible occasion. In class I refused to compete.

I had the slightest of lisps and stammers, and would sooner pretend not to be able to read than sound my words. I was shortsighted and so could not read the board; this in turn added to my reputation for stupidity. Yet I began to read widely at home, mispronouncing words, but catching and attaching meaning to words by the sheer repetition in bulk of book after book.

I made two great discoveries at this time. The first was that the dictionary given to me as a spelling aid could often aid me to discover the meaning of words in my books. The second discovery was that the wild life in my garden was more interesting than lessons. When not studying natural history I was getting up to active devilment. Many a gardener found his prize flowers slashed, or his best tools scattered round the garden and his shed wrecked. At school I took a leading part in all playground and class disorders.

The only praise I ever got was in art

The only way I sometimes came to terms with life was in art. I could draw and paint the bloody violence of war ad infinitum. Sometimes I used to try to paint some of the wild life I saw, inspired by some coloured plates from an American geographical magazine. The only praise I ever got was in art; but I paid more attention to my contemporaries' praise than to a teacher's mark.

When I was twelve my class teacher was a poetry-loving sportsman. We all set out to emulate him. The use by Tennyson of sound values associated with the shape and colours of nature, induced me to listen more carefully to words. The accidental reading of *The Princess and Curdie* with its vast paragraphs of Victorian gothic imagery spurred me on to write a poem. The spelling was not only wrong but was not even phonetic. The writing was mostly blots – oh how I hated copy books! My best friend told me it was fine and I decided to keep on writing from that day. I never showed my work to any teacher.

About this time I began to excel in running. Having won all the races I entered that year and still found myself thought stupid in class, I withdrew from all sports as far as the school was concerned. Unofficially I practised with the others when no staff were present; and my contemporaries found me peculiar because, although I beat them with ease, I would not run for house or school. Not even my house captain could persuade me, in fact.

I tried to run away from home and school. I got over fifty miles away before fear drove me home again. I preferred school to the police. I was, after all, the boy who emptied the machines of pennies on the pier at the age of eight. The psychologist put it down to home background, as my parents had all but agreed to separate. I, on the other hand, rejected all grown ups, so that my conversation with him was an attempt to cover up my emotions and ambitions.

Religion at this time entered my life. Christ had been rejected and I was rejected. We had a lot in common, I thought!

Grammar school at fifteen

At the age of fifteen my sole remaining close friend told me his mother had promised him a bike if he went up to the next class. Upset by the thought that I might lose him, because 'C' class boys rarely kept friends in other classes, I decided to try to go up with him. Lesson times saw me actually attending. Weekends, evenings and holidays saw me shut up with my books. My friend and I tested each other desperately. That year in the school examinations I got no position lower than fourth in any one subject. However, I must admit that I invented an illness on the day of the Maths exam. My friend failed as usual.

Everybody seemed astounded, not least the 'A' class boys overtaken by me. For once I was the centre of interest. Asked by the Head what I wanted to do, I said, in a flood of enthusiasm, 'Pass some more examinations'.

Nearing the age of sixteen, I reached Grammar School. My Head had pulled strings, saying I deserved the chance. Within a term I was placed in a class consisting of those children who wanted to take their 'O' levels and who really weren't expected to pass. My Maths was promising, but lacked basic concepts. My English was creative, but poorly spelt and presented. My other subjects were undisciplined, to say the least, except for art which was rapidly developing.

After two years I was put in for the examination. I was told to report back to the same class next term ready to sit again in the spring. When the results came through I had enough passes to get into the sixth form. I was told I had to take English Literature and Geography to back up my Art. I could not take Biology, the subject in which I was passionately interested, because of the timetable clashes. I now rejected Grammar school standards, but not the actual subjects. In Geography I was told not to be a fool when I read a book on Continental Drift, instead of some dull thing about South America. In Literature I read all of Hardy's novels instead of just one, and learnt to love poets not on the set list. I took and passed these subjects, just, with Art, at the age of nineteen and a half.

The conflict set up however, coupled with a complete break-up of home life, saw me entering the Slade School of Fine Art under the care of several psychologists. My years at college were largely meaningless. I was there because the school had decided it was best for me. My own inclinations, when not suffering from severe depression, had by now turned entirely towards academic study. I studied history, science, psychology, poetry, ethics and philosophy as well as art. I failed my diploma examinations in painting, whether due to the nervous breakdown or to my rejection of specialization, I do not know.

I applied for jobs in various fields, accepting the first offered. It was teaching Art and History in a small private school. I began to enjoy life in spite of a near riot in my first term. My examination results in the top classes were equal to those obtained by the Oxford Graduate who had taught before me. He however had not enjoyed teaching 'kids' as he called them. To me they were people and I remembered all the difficulties I had had at school. My poor writing and spelling still held me back from teaching effectively in class and so after three years, I applied for a one year course for Mature Students at Avery Hill. Here I learnt to enjoy educational theory and to accept that modern maths is interesting in itself. I even finally learnt my eight and nine times tables. But I was still tied to Art as my main course of study, having no suitable background, except for Geology 'A' level, recently passed, for science studies.

Since 1961 I have been teaching in state schools mostly with backward children. I still have to print my words on the blackboard to be legible and children prefer referring to a dictionary for spelling rather than me. I still muddle left and right. Despite painting a mural for the Botany Department, Durham and writing a few educational articles, I would still like to take a B.Sc. General. Local Authorities look astonished at my effrontery when I ask for a grant. I'm hoping that the Open University will enable me to complete my education.

What is remedial education? R. C. Ablewhite

'(39) It would be useful if UNESCO, in cooperation with others concerned with the problem, would draw up as soon as possible basic terminology for the broad categories of handicapped children.'

(Recommendation no. 51 to the Ministries of Education, Twenty-third International Conference on Public Education, Geneva, 1960).

It is certain that a standardized form of terminology would do much to improve international communication but the more one moves around our national educational system the more one becomes aware how, even in this comparatively small island, loose terminology hinders intelligent communication, leads to violent disagreement between people whose opinions are basically identical and fosters overlap of function leading to jealous rivalry between groups which have the same basic aims and ideals.

To say that we ought to standardize the vocabulary is, however, far easier than to do it. In the first place, it is doubtful if there is any educational source of authority whose decisions on terminology would be generally acceptable. For example, the Ministry of Education (1946 and 53) defined a category of educationally subnormal children which consisted of 'those children who are retarded by more than 20 per cent of their age and who are neither so low-grade as to be ineducable nor detrimental to others'. Later the Department of Education and Science (1964, ch. 2, para. 1) suggested that the term 'educationally subnormal' should be reserved for 'pronounced educational backwardness' and that the remainder might be known as 'slow learning children'. Unfortunately, the Regulations were not amended accordingly and consequently many people are very shy of accepting the term 'slow learner' when there is no such category in the Regulations to enable slow learners to enjoy the same privileges of special educational treatment as are extended to the educationally subnormal, i.e. maximum size of class, allowances to teachers, etc. In the second place, it appears to be extremely difficult to get people to forget old terms. For example, the other day I heard an elderly teacher refer to the Welfare and Attendance Officer as 'the school board man'. The School Boards came to an end with the Education Act of 1902 which was before this teacher was born. Truly, old terms die hard! It would appear that change of terminology can only come through general agreement of those concerned and be assimilated into the general vocabulary by usage; a long process.

One of the very loose terms employed without a great deal of thought is 'remedial education.' Like the term 'education' itself it means many different things. In fact, it means so many different things that it is in danger of meaning nothing at all. The welcome arrival on the education scene of the National Association for Remedial Education and the Association's excellent journal Remedial Education should surely force us to consider the meaning of the term 'remedial education' and the function of the remedial teacher. It is my hope that this article will serve to start a general discussion amongst members of the National Association for Remedial Education on these two points in the hope that definitions generally acceptable to the Association and to those of its friends and allies who often appear to be doing overlapping work may, in due course, be reached.

The first relevant item to catch my eye on this matter was contained in a report by Kellmer Pringle and Sutcliffe (1960): 'Not all children who have fallen behind with their work need a special educational approach. Where the child remains willing and able to learn, systematic coaching may well meet the case. Remedial education is needed by children whose educational underfunctioning is accompanied by emotional difficulties.' This year both Tansley (1967) and myself (1967) have, quite independently, felt compelled to separate the technique of a systematic attack upon the area of educational weakness – in our case, reading – from the much more difficult but no less systematic attack upon what Tansley calls 'the

underlying primary causes which have hindered the psychophysiological development of processes involved in reading.' Although we have differed in the manner of presentation and on areas of priority, I find myself in complete agreement with Tansley's statement of ten principles involved in the remedial education programmes for children with severe reading disabilities. Although we have been concerned with the teaching of reading, I feel certain that the same separation would apply in the teaching of mathematics. It appears to me that Tansley's choice of title was made for the very same reason that led to my sub-title: 'A problem in two parts'. There is a very real distinction between what amounts to an initial teaching programme, however late in life this occurs, and remedial work as I understand the term.

Many local education authorities have set up various forms of machinery intended to help teachers with pupils who do not appear to learn as quickly as most. The majority of these schemes concentrate on the problems of reluctant readers. I have investigated some of these schemes and, although they differ in detail, they have a number of points in common:

- 1. Enthusiastic teachers are appointed with a sound knowledge of the basic principles underlying the learning processes. Many of the teachers are additionally trained and, in some cases, the system is under the general guidance of the educational psychologist.
- 2. The teams work according to a systematic plan of campaign.
- 3. They work with either individuals or small groups.
- 4. They normally direct their attention to the junior school
- 5. The teachers are in receipt of additional allowances both in the way of salary and in the way of equipment.
- They keep very careful records of progress.
- 7. The results of their work are excellent, not only when measured in terms of increased reading-age but also when measured in terms of happier and more contented children.
- 8. None of them supplies anything more than a good initial teaching programme.

It is emphasized that these enthusiastic teams of teachers

of reading are worth their weight in gold. In too many of our junior schools, too many teachers still believe that all the basic skills in reading should be taught in the infant schools and have little to offer the reluctant reader apart from a supply of books—sometimes good but more often totally inadequate — and the opportunity to read them, sometimes aloud and sometimes silently. The odd thing is that, providing the material and opportunity are available, some 90 per cent of the children learn to read by the time they have reached the third year of the junior stage. I have recently carried out checks of the whole of the third years in both streamed and unstreamed junior schools in areas where there is no specialist reading set-up operating. The results were as follows:

School	Streamed of unstreamed and number of pupils	i	Percentage of children scoring below minus one sigma on Watts Sentence Reading Test 1
A	Unstreamed	93	9.7
\mathbf{B}	Streamed	110	10.0
C	Unstreamed	99	9.9
D	Streamed	103	11.6
\mathbf{E}	Unstreamed	87	10.3
F	Unstreamed	90	9.0

These figures are supported by the figures reported in the 1962 Brighton Survey (Hammond, 1967). In the comparable age-range -9 years 6 months to 9 years 11 months - the following number of children were $2\frac{1}{2}$ years or more retarded in reading:

Boys: 58 out of 465 (Table 4) Girls: 43 out of 447 (Table 2)

Total: 101 out of 912=11.1%

From the same tables it can be calculated that in the 11 years 6 months to 11 years 11 months age-range the ratio has risen to 15 per cent. It should be noted that the figures are reported on a standard slightly more severe than mine and on a test which is admitted to be lenient!

The trouble is that a success-rate of 90 per cent is generally regarded as a very creditable result and the teacher has no cause to think he has failed. Consequently, he never stops to consider that his teaching skill should be measured by those who have failed rather than by those who have succeeded. Given a systematic teaching programme, a very large proportion of this problem 10 per cent would have succeeded in learning to read. To a certain extent, the colleges of education must take some of the blame for this lack of teaching skill in the basic subjects. Of the 157 qualified teachers who have now passed through the course for experienced teachers in 'the education of handicapped children' at Leicester only eleven have been able to recall any specific lectures or other guidance on the teaching of reading and most of these eleven were infant trained. Even allowing for some shocking bad memory, this is an alarming figure but it is, I think, fair to state that the position seems to be steadily improving. Another portion of blame must be carried by teachers who think that work with reluctant readers is based 'on a set of principles which differ appreciably from those principles which are the basis for the school's regular developmental reading instruction' (Heilman, 1961).

It would appear, then, that the contribution made by these teams of specialist teachers consists largely in their ability to provide a sound initial reading programme for the 10 per cent in lieu of an inadequate or even non-existent programme in the school. To some extent this function could be called 'remedial', in so far as it remedies or seeks to remedy some disgraceful deficiencies in our educational system. Some areas, of course, are invoking the aid of the machine for this purpose. One of my teacher-students who was interested in programmed learning took issue with me on whether the teacher should produce his own programmes or buy them. His line was that so few teachers knew anything about teaching reading

that it was up to people like him to produce programmes that they could use in their teaching machines. To me, this puts the classroom teacher in the same position as the parson who buys his sermon. I would expect all primary school teachers to know the principles underlying the learning processes but, until they do, there will be plenty of work for specialist teachers of reading and for teaching machines.

The work done by these specialist teachers is often called remedial work. The teachers are often called remedial teachers and advertisements appear for a remedial teacher of reading. All sorts of examples of this work are quoted in the literature, both here and abroad, under the general heading of remedial teaching. Heilman (1961) had this in mind when he asked his students to list all the principles of teaching they associated with remedial teaching of reading. He summarized the results and found that the list turned out to be no more than a summary of 'any good teaching programme'. My contention is that this work is not remedial at all from the point of view of the child. To remedy means to put right that which is wrong. In far too many of these cases there was never anything that went wrong for the simple reason that it never started. What, then, do I regard as true remedial work?

Here, I find myself in complete agreement with Tansley (1967) in his definition of remedial teaching: 'By remedial teaching is meant teaching which is based on a different diagnosis which forms the basis for scientific remedial procedures.' Amongst the 10 per cent we find small but important groups of children who seem to present problems which are more than educational problems, including children who have received all that the best coaching can give, who are obviously not lacking in general ability but who have failed to learn to read. There appear to be two main subdivisions: difficulties of a psychological nature and difficulties of a physiological nature, each of which category can be further subdivided. Moreover, to this small number of children who present primary difficulties must be added those much larger numbers of children who, because they have been denied a good teaching programme in the primary stage of education, have acquired emotional problems of a secondary nature consequent upon suffering the effects of long-term failure at school. I have tried to show in my book how the secondary consequences of long-term failure are beginning to show themselves towards the middle of the third year of the junior school.

It appears, then, that from the age of about nine-plus certain cases arise in which coaching, however well devised, is ineffective. Something is evidently wrong with the child and the technique has to be switched from a direct attack upon the area of educational weakness to an all-round appraisal of the whole child. The aim is differential diagnosis and true remedial treatment and this implies a multi-disciplinary approach. Tansley's experience has led him to give his priorities on the physiological side, particularly in the field of neurological abnormalities, while I, by virtue of a different kind of experience, have become more concerned with the emotional problems of long-term failure. We both agree that, while differential diagnosis is of the greatest importance, no teacher can afford to wait until a final diagnosis is made and that sound remedial work designed to reduce frustration and to assist such things as visual and auditory discrimination, motor control and language/speech improvement should be carried on simultaneously with the diagnostic investigation.

Here then I offer just two quite different types of work, both called remedial education. There are, of course, many other views. A speech therapist, a physiotherapist, an educational psychologist, a social worker and many others could fairly claim to be involved in remedial education. What is the place and the function of the remedial teacher? Is he there to remedy the gaps in educational provision, to cover up for the unskilled teacher in the classroom, to make differential diagnosis, to usurp the position of the educational psychologist or to be the industrious mechanic to carry out programmes decreed from above?

ABLEWHITE, R. C. (1967) The Slow Reader: a problem in two parts,

DEPARTMENT OF EDUCATION AND SCIENCE (1964) Pamphlet

46: Slow Learners at School, HMSO.

Remedial education: programmes and progress

- HAMMOND, DOROTHY (1967) 'Reading attainment in the primary schools of Brighton', Educational Research, 10.1.
- HEILMAN, ARTHUR W. (1961) Teaching Reading, Charles E. Merrill Books Inc.
- PRINGLE, M. L. K. and SUTCLIFFE, L. (1960) Remedial Education: an experiment, University of Birmingham Institute of Edn.
- MINISTRY OF EDUCATION (1946) Pamphlet 5: Special Educational Treatment, HMSO.
- TANSLEY, A. E. (1967) Reading and Remedial Reading, Routledge & Kegan Paul.

3 Specialization for all Gerald F. Platt

In an article printed in *The Times Educational Supplement*, 9 June 1972, F. J. Buglioni stressed the importance of specialization in junior schools. His claim was that the position of the general all-purpose teacher in the junior school was outdated, and that with all the complexity of teaching thirty to forty children the whole of the curriculum, such a position laid too much responsibility upon the individual teacher. Buglioni also felt that training all teachers to teach reading would demand too much of the all-purpose teacher. It would demand that the teacher should be able

'to devise a strategy for teaching reading to a particular group of individual children: to be aware of the developmental and psychological aspects of teaching, to provide alternative approaches for different children: to be aware of the content of each of the thirty-seven reading schemes available: and to be able to apply the most appropriate one to the children in his charge: to be able to analyse the difficulties which some children will experience and to devise a programme for such children: to give remedial help to those in need.'

If this were his only role, Buglioni argued, the general teacher would have a huge task, but if added to his other responsibilities such a task would be impossible.

Buglioni's answer to such a problem lay in (a) if team teaching was in existence, each member would be responsible for an individual area of the curriculum and one teacher would be in charge of language development and reading; (b) perhaps in open plan schools, specialists would operate in well-equipped specialist corners; (c) or in the traditional classroom, class teachers would work under the direction of 'master teachers' who would devise schemes and act as consultants.

The writer ended his article by intimating how much easier would be the planning of work and experiences and marshalling resources for learning, not in contact with children. 'We conceive of the teacher too much in terms of personal contact with his charges, while paying lip service and no more, to the organization and planning of learning which precedes it.'

It is my intention to express views contrary to those of Buglioni, to show that efficient teaching of reading is not practical if administered in such a specialist way, and to outline a practical model for administering the teaching of reading in the primary school.

In-service training

I am not sure how much stress we can place exactly upon inadequate primary school teachers' initial training as a contributory factor in low reading standards, but I am convinced in-service training for every primary school teacher

can improve such standards.

In Manchester, the Schools Psychological Service has instigated what I think is an entirely original programme in in-service training aimed at the teaching of reading. Four senior area remedial teachers organize consecutive monthly courses for primary teachers, in four reading centres. The LEA provide part-time teachers to replace teachers attending courses for four mornings a week for four weeks. One member of staff of approximately twelve schools, attends training and the aim is that every junior and infant school in Manchester will finally have been provided for in this way. The content of the courses cover all the strategies mentioned by Buglioni. However, the biggest difference between other training courses and the Manchester project lies in the emphasis on practical application. Because the course tutors are practising teachers, follow-up measures, whereby the tutors work within the teachers' classrooms, are essential ingredients. Strategies which are acceptable in the lecture room can be heavily criticized, to the tutor's face, in the classroom, if they are found not to work. A happy balance is perpetuated, therefore, between theory and practice. Each tutor also has a remedial staff of peripatetic teachers who service the individual needs of the teacher's children. At least one afternoon a week, the course teachers can compare methods and organization, etc., with the tutor and the remedial teacher. Apparatus and other material can also be placed in those classrooms which warrant the most need. If other LEAs in the rest of the country could instigate such in-service training, if only for their disadvantaged areas, such measures, I am sure, would give these schools some expertise in handling their own reading problems.

It is, perhaps, debatable whether teachers should be released from their schools during their teaching time, thus possibly neglecting valuable opportunities for teaching their children. Staffing problems of absences, etc., can place heavy burdens upon schools. Evening courses are usually less favoured by the majority of teachers who are physically, emotionally and mentally tired after a day's teaching, although such courses in reading are always very well attended. Also, such courses not only demand long attendances, but much mental alertness is required of the teacher - who attends for something like 21/2 hours per day, 40 hours per week, and is expected to contribute ideas and information. Compulsory training attendance during school holidays would perhaps alleviate some problems. My experience however, has been that very few schools have criticized the Manchester project as regards day release. Industry has been releasing its employees for many years.

Course content

The mastery of reading is perhaps the only aspect of learning which embraces so many skills and subskills. The teaching of reading does not just entail teaching skills peculiar to learning to read. Learning to read encompasses skills and subskills which are necessary for learning any subject already in the primary school curriculum. Activity methods practised in the infant school, as well as PE can help the child with neurological, motor, physical, spatial, and language development, all of which, according to research, are part-and-parcel of the early reading programme. Later, in the junior school, maths and social studies exaggerate the differences between good and poor readers, because of the teacher's dependence upon reading as a vehicle for communication. In-service training,

again, with the teaching of reading being shown to be an area of the curriculum incorporating general educational development principles, can help *all* teachers in the primary sector.

The case that I am making, therefore, is that the all-purpose teacher is the better person to teach reading, the most valuable teaching programme caters for the all-round mental and physical development of the child, especially in the early part of the child's education.

The remedial situation

No-one would deny that to help older junior children who are beginning to experience reading failure, the teacher must have a special interest in these children. If we exclude children who are late arrivals at the school, no child, especially in the attached junior-infant school, should suddenly materialize suffering from reading difficulties. All these children, if their progress through the school has been carefully observed, should have been placed on a longitudinal, individual reading programme. Such a course could have been supervised by as many as five or six teachers, or more, by the time the child is ten years old. Each one of these teachers must, of necessity, have a certain amount of expertise in dealing with reading problems, if he is to take advantage of every opportunity which arises during the teaching day. Careful pre-planning and organization of the reading programme must be carried out by each individual teacher if such planning is to be meaningful to him. Therefore, testing should provide the ingredients for the teaching plan: materials should be examined for suitability; use of materials and teaching methods should arise from the teaching plan; and testing and recording should provide the necessary teacher controls. As each term proceeds, the teacher must be aware of all the implications of the teaching plan, so that all the opportunities may be grasped as they arise. If an additional hour was added to the school day, say between 4 p.m. and 5 p.m. for the teachers to remain at school, such time could be spent in preparation; as well as marking and preparing for other lessons.

A specialist teacher could find that he had to spend most of his teaching time explaining the aims, objectives, implications, and methodology of his master reading plan to his colleagues, and would, therefore, have to start an in-service training programme of his own – if his colleagues would let him, and he had the time. A peripatetic remedial service, however, can provide just the right amount of practical advice, if they have the backing of good in-service training for the class teachers. Such remedial teachers can work in conjunction with the class teacher to produce an adequate programme for the remedial children – they can even take the teacher's class to release the teacher to prepare material, to work with small groups, to catch up with recording, etc.

Need for continuity and communication

All the expertise, planning and preparing in the world, however, will not eradicate reading problems without the continuity and communication between infant and junior departments, between classrooms and between separate schools. By continuity and communication I mean extension and continuation of teaching methods, testing procedures and recording, etc, which are dependent upon the desire felt by headteachers, staffs and schools to communicate with each other. All teachers in the primary sector, not just specialists in reading, must feel a desire to redress reading failure, to help their colleagues and learn from them, to pass on ideas and information concerning their children. Show me a staffroom in a disadvantaged area, where half the staff do not meet or talk to the other half, and often I will show you a school which has reading difficulties. Show me a young poor reader who has passed through three or four schools and brings no detailed records with him, and I will show you a child destined for illiteracy. I would go so far as to say that the importance of teaching methods and apparatus pale into insignificance compared with the need for such continuity and communication. Very few books on the teaching of reading stress the vital roles of the headteacher and adviser in this respect. If, for the sake of teaching reading, a specialist trained teacher has sole responsibility in this field, then the vital ongoing, hour by hour, day by day, procedures necessary for enlightening remedial children and teachers at the most pertinent times, would be

impossible. The adviser, however, in charge of an area, can spread ideas and information; can see the special needs of the different schools, organize gatherings of teachers to discuss common problems. The head teacher also has a similar role to play within his own school, and much of what goes on in his school is influenced by his own intelligence, ability and experience. If the adviser, the head teacher and the staff can share an in-service training experience concerned with teaching reading, then continuity of practices and communication are vastly enhanced.

Conclusion

The most significant factor I have discovered through my experiences and research concerned with the efficiency of teaching reading, has been the need for communication of ideas, knowledge and information between advisers, peripatetic remedial teachers, head teachers and class teachers.

Secondly, there would seem to be a need for continuity of basic practices, especially between separate infant and junior schools or departments, and between classrooms within individual schools assisted by advisers and peripatetic remedial teachers. The roles of advisers, head teachers, and peripatetic remedial teachers in this respect, need to be encouraged.

A third point is that literacy is derived not from coaching reading skills, but from a wider more global education – all primary teachers need to be aware of the integrated nature of the skills necessary for learning to read, and they are collectively, the best people to inculcate such learning. This does not, however, encourage the beliefs that reading skills for their own sake, have not to be taught, but that they have to be taught within a wider context.

Lastly, good in-service training in the teaching of reading can help all primary teachers to teach reading and also foster growth of learning and understanding. Date 6... 10. 77.

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4 Change in remedial education

P. D. Pumfrey

The recent large-scale survey by Sampson (1969 a, b, c) has indicated that a considerable number of experienced and professionally well qualified individuals are engaged as peripatetic remedial teachers working for remedial education services. As such, these teachers are not responsible for the full-time education of children. The majority of the peripatetic remedial services are concentrated at the junior school level, presumably on the basis that the earlier children's difficulties are dealt with, the more likely is their satisfactory modification. The aims of these services vary widely. Some emphasize the importance to the children's adjustment of a satisfactory level of attainment in the basic subjects. Others look at the personal adjustment of the child and see this as central, assuming that to facilitate the child's emotional development will free the psychic energy involved in inner conflict, and allow the child to make rapid progress in the basic subjects (and others) with minimal help from the teacher in a formal sense.

In practice, most peripatetic remedial teachers are concerned with both the child's failure in the basic subjects and in primary or secondary maladjustment. It is frequently stated by peripatetic remedial teachers in the primary school that an essential aspect of their work is to obtain the cooperation of the class teachers in effecting the modification of a child's attainments, attitudes and adjustment. As most peripatetic remedial teachers work with the child for limited periods, usually two or three times per week, the remedial teacher must seek ways of maximizing the positive effect of his interaction with the child referred to him and in obtaining the class teacher's full cooperation in helping the child.

There is an unfortunate tendency for *some* class teachers to

There is an unfortunate tendency for some chast entered that a child being helped by a peripatetic remedial teacher is having his needs adequately met. In fact, unless the remedial teacher has cooperated effectively with the class teacher both

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in helping the child and in preventing similar difficulties arising in the future, the class teacher's assumption is probably incorrect. Most peripatetic remedial teachers work in rooms, cupboards, corners, and/or corridors, apart from the class teacher. The staff room at break times presents the main opportunity for discussion between the remedial teacher and the class teacher, unless the remedial teacher has to use this time in travelling to another school. In view of the doubtful value of peripatetic remedial teaching in terms of modifying both attainment and attitudes, documented in the research (see recent review by Chazan, 1967), is it not time to consider modifying the relationship between peripatetic remedial teacher, class teacher and pupil?

Would it be better primarily to improve the relationships between the class teacher and the failing child rather than between the remedial teacher and the failing child and hope for a reflection of this to come about in the classroom situation? After all, the class teacher is with the child far longer each week and his influence is likely to be proportionately greater. If the peripatetic remedial teacher were to take the class in whatever manner he deemed appropriate, and allowed the class teacher an opportunity of working in small groups with the failing children, would not the benefit to the failing children be at least as great as in the situation where the remedial teacher withdraws children from the classroom situation? This practice, in fact, often occurs where fortunate primary schools have a 'floating' teacher.

But would this be 'wasting' the often undoubted expertise of the peripatetic remedial teacher? In the case of the skilled and experienced primary class teacher the argument is less convincing than if the class teacher is one of the 'learner teachers', fresh from college, distressingly often found in the most needy classes of the most needy schools with high staff turnover.

A modified team teaching approach is indicated as likely to be more beneficial to the children generally, the class teacher and the remedial teacher than common current practice. If, as one expects, the remedial teacher really has some expertise likely to be of value both to children and to other teachers, the best way of establishing the dialogue necessary for its dissemination to other members of a school staff would be by giving the teachers a chance to work together.

There are, however, many practical snags to such a scheme – or there often appear to be. The traditional attitude still commonly found in the junior school, despite current trends towards greater flexibility in teaching organization, can be summarized as 'the class teacher's room is his castle'. This attitude is reflected in the generally negative reaction of a number of groups of junior school teachers, attending a full-time special course of advanced study, to the suggestion that their practical remedial work with children should take place in one large well equipped room containing all the teachers and the children they are to help.

After the experience and the ensuing discussions of their work, the teachers' attitudes towards such an arrangement have tended to become positive. The teachers appreciate the advantages to the children and to themselves inherent in such a system. In view of this change in attitude, it seems probable that, in the general educational system, some teachers' subconcious fear of exposing their professional competence before colleagues could be inhibiting the development of peripatetic remedial teacher-class teacher liaison. The step towards variations of a modified team teaching approach is, in prospect, anxiety-arousing in some teachers. In retrospect, it is seen to have advantages and not to be threatening to the teacher. There would seem to be a case for the staff of remedial education services and the schools they serve discussing ways of introducing an appropriate modification of the team-teaching approach. Provided an adequate evaluation scheme was built into such an innovation (Young, 1967), a more effective remedial education for failing children might be achieved by such combined efforts than is currently the case.

References

CHAZAN, M. (1967) 'The effects of remedial teaching in reading: a review of research', Rem. Ed., 2.1, 4-12.

SAMPSON, O. C. (1969a) 'Remedial education services: report on an enquiry. I. Facts and figures', Rem. Ed., 4.1, 3 8.

Remedial education: programmes and progress

- SAMPSON, O. C. (1969b) 'A real need for rescrutiny', Special Education, 58, 1.
- SAMPSON, O. C. (1969c) 'Remedial education services: report on an enquiry. II. Views and methods', *Rem. Ed.*, 4.2, 61-5.
- YOUNG, M. (1967) Innovation and Research in Education, Institute of Community Studies Reports, Routledge & Kegan Paul.

5 Reading standards in educational priority areas: a memorandum to the Bullock Committee, January 1973

A. H. Halsey, Caroline Moseley, Joan Payne, George Smith, Teresa Smith, Paul Widlake

(The main task of drafting this memorandum was undertaken by Teresa Smith. The full memorandum ran to 73 paragraphs; only the main statement of research findings and recommendations has been included here. A much fuller account of the data appears in *Educational Priority*, HMSO, Vols 1 and 2.)

Introduction

The evidence contained in this memorandum is based on the four educational priority area (EPA) projects in London (Deptford), Liverpool, Birmingham and the West Riding, sponsored jointly by the Department of Education and Science and the Social Science Research Council for the three years 1969 to 1971. A final report has been presented to the DES and the SSRC. A first volume of the findings, Educational Priority: EPA problems and policies, vol. 1, by A. H. Halsey, has already been published by HMSO; four further volumes have subsequently been published.

Three of the EPAs were situated in inner-city areas, the fourth in a small, economically depressed mining town. The problems facing the forty-five primary schools involved in the projects included outdated and ill-equipped buildings, over-crowding, rapid pupil and teacher turnover, high pupil absenteeism, large numbers of immigrant pupils with language difficulties, and the limiting home circumstances of the children's families.

While the EPA project's brief was to cover a far wider range of educational problems than reading – the whole range of educational experience in run-down inner-city and small-town areas – information concerning reading standards and problems was obtained during the course of the projects, and literacy programmes were mounted. In order to build up a picture of the problems facing such areas, a range of baseline data was collected in the spring and summer of 1969, covering the schools, pupils and teachers, families and the community. The findings on reading from this baseline data are presented in the first section. We then turn, in the second and third sections, to programmes set up by the projects which developed reading and related skills. The final sections deal with conclusions and recommendations.

Reading standards in EPA primary schools

The first task of the EPA projects was to assess conditions in the project schools. As part of this programme the reading ability of second, third and fourth year junior school was measured (in Birmingham because of practical difficulties fourth year juniors were not tested). It was not possible to test all absentees, but overall approximately 90 per cent coverage was achieved – a total of 3,815 children.

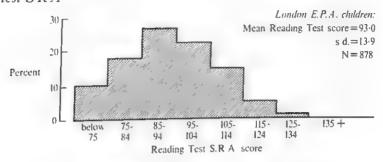
The reading test used was Version A of two parallel tests, Streaming Research A and B, developed by NFER. This is a group test covering the junior school age range which requires children to complete a given sentence with a word chosen from four or five alternatives. To perform the task the child must read and understand both the sentences and the alternatives. The test was designed to be administered by classroom teachers, and is standardized on an English sample at one month intervals to give a mean of 100, a standard deviation of 15, and a range of 70 to 140 points.

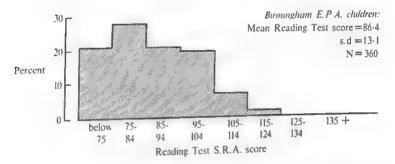
Figure 5.1 shows the means and frequency distributions of the test scores of non-immigrant children in the four areas (using the DES definition of an immigrant child). The picture is one of extremely poor performance. Score distributions for the London, Liverpool and West Riding project schools are very similar, and the means all lie within 1½ points of each other, half a standard deviation below the national mean. Scores in the Birmingham project schools are worse still: the mean is almost a full standard deviation below the national

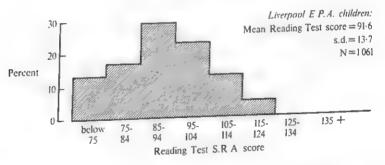
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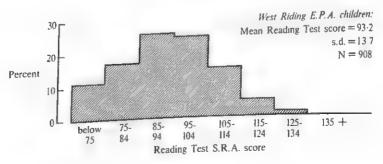
Figure 5.1

Percentage of non-immigrant junior schoolchildren in each project area, falling in various score ranges of the reading test SRA





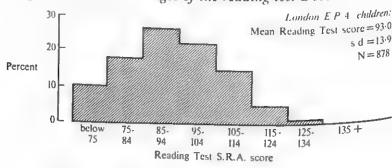


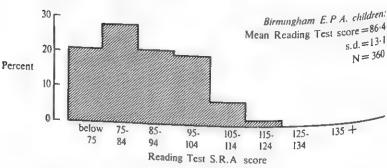


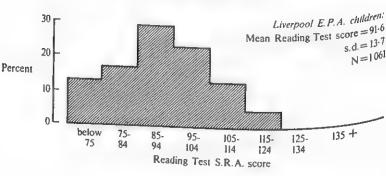
Remedial education: programmes and progress

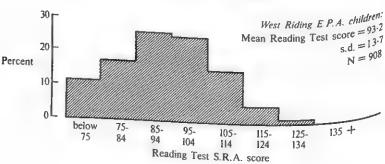
Figure 5.2

Percentage of West Indian and Asian immigrant junior schoolchildren in the London and Birmingham project areas falling in various score ranges of the reading test SRA









The exceptionally low scores in the Birmingham proiect schools require comment. They are in part a product of the DES definition of an immigrant child which excludes both the child of foreign born parents who have lived in this country for more than ten years, and children of mixed immigrant and non-immigrant parentage. As there were far more immigrant children in the Birmingham project schools than in any other project area it is likely that many children in the Birmingham schools were classified as non-immigrants but nevertheless had difficulties with the English language.

There were enough West Indian children in the London project schools and both West Indian and Asian (i.e. Indian and Pakistani) children in the Birmingham project schools to make a separate analysis of their scores possible. These results are shown in Figure 5.2. In each case mean scores are well below the mean for the corresponding group of non-immigrant children, though it should be noted that the London West Indian children have a higher mean score than the 'nonimmigrant' children in the Birmingham schools. The distribution of scores of the Asian children is so strongly skewed that it bears no resemblance to the normal distribution that would be found in a nationally representative sample. Clearly the reading test SRA is in no sense a measure of the reading ability of these children, but only of their command of English.

Using a score of 80 or below on the SRA reading test to distinguish non- or virtual non-readers, Table 5.1 shows the number of children in this category.

It is assumed that by the second year in junior school all except the specially retarded have made considerable progress in reading. Beyond this point there is less emphasis on reading programmes and teachers have less training or experience in the teaching of reading. Yet the table shows that in the EPAs there was a high proportion of junior school children who had hardly made a start on reading. Moreover, analysis of the trend in the reading scores for different age groups indicates that a sizeable proportion are still non-readers when they enter the secondary school (see Figure 5.3).

In addition to the reading test SRA all children in the project schools, infants and juniors, were given the English Picture

Remedial education: programmes and progress

Figure 5.3

Mean reading test SRA scores of non-immigrant children, by age and project area

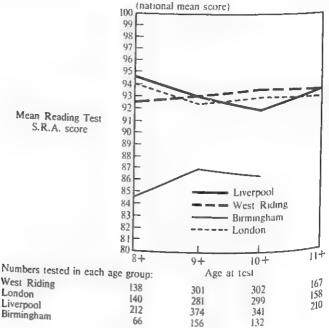
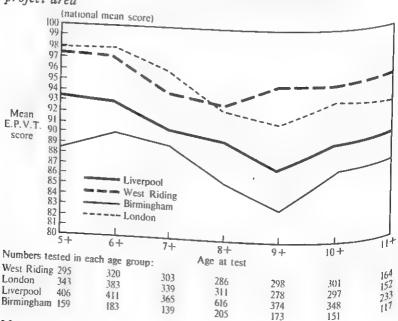


Figure 5.4

Mean EPVT scores of non-immigrant children, by age and project area



Vocabulary Test (EPVT). This is a test of listening vocabulary which does not require any reading skill, but which is nevertheless relevant to the understanding of reading difficulties. Mean scores on this test were also well below the national average, and the differences between immigrant and nonimmigrant children were similar to those observed on the reading test SRA. The most significant finding from these results was that the scores grew progressively worse in relation to the national average as the ages of the children increased (see Figure 5.4). This deterioration was offset by a slight improvement during the last two years of junior school, which suggested that the more intensive teaching which is generally given at this stage produced results. Additional evidence from the West Riding suggests this relative decline continues throughout the secondary school period.

It has been argued that the overall performance in EPAs is pulled down by a very low set of scores by a small group in an otherwise normal population. The figures show, on the contrary, a much more general pattern of low attainment, with very few children falling in the higher scoring groups.

This pattern of low achievement is underlined by more detailed figures from one of the project areas, the West Riding. When the scores for schools designated as EPA were compared with those for schools not so designated in the project area, there was a clear difference of some five points on the EPVT and four points on the SRA. Even when the non-readers were excluded, there was a difference of between five and eight points when the EPA and non-EPA schools were compared. In some schools up to 30 per cent of the children were classified as virtual non-readers. This is a powerful argument against the view that the problem is to identify individual 'underachievers': 'under-achievement' is widespread and not restricted to a few individuals.

Summary (4-13)

The children in the four EPAs scored well below the national average on both the reading test SRA and the EPVT.

Figures for the second, third and fourth year age groups in the junior schools showed that between 17 and 35 per cent of the non-immigrant children could be classified as non-readers or virtual non-readers. This picture of low performance was not confined to the children entering junior school. On the contrary, scores declined progressively with age, and there was only a slight improvement in the last two years, probably reflecting the more intensive teaching preparatory to transfer to the secondary school. A sizeable proportion of children entering secondary school were virtually non-readers. There is tentative evidence to suggest that the decline in performance does not end with junior schooling, but continues throughout the secondary school. The problem is not one of individual 'under-achievers' in otherwise normal classes, but a much more general and widespread pattern of low attainment.

Conclusions and recommendations

In Volume 1 of Educational Priority, broad conclusions and recommendations are outlined for development in EPAs. Action-research is an effective method of practical innovation and policy formation; its findings should be made available as a basis for further experiment and decision-making. Here more detail is given to the findings that relate specifically to the development of reading skills and the teaching of reading.

Reading standards in EPAs

Testing conducted in the four EPAs indicated that possibly 25 per cent of British-born children (that is, children not classified as immigrant according to the DES definition) are unable to read adequately during their stay in the junior school.

The reading problems of immigrant children, especially Asians, are even more serious. But this is tangled up with their difficulties over the English language.

The pattern of low performance in EPAs is not confined to the early years. It persists throughout the junior school, and a sizeable proportion of children enter secondary school still unable to read adequately

The low level of reading skill is associated with low performance on other tests which reflect language skills related to reading and reading problems. Here, too, there is little evidence for improvement over time: in relation to the national average, EPA children do less well when they leave primary school than

when they enter it.

National sample surveys may tend to under-estimate the degree of reading difficulties in EPAs. The EPA findings on the proportion of junior children classified as poor readers are more comparable to recent surveys such as the ILEA literacy census and surveys in London boroughs.

This indicates a need for more detailed information. collected through a national census survey of reading standards in EPA schools. This would identify the problem more accurately and could serve as a basis for allocation of resources according to a policy of positive discrimination.

The low mean scores of both immigrants and non-immigrants in EPAs are attributable not to a small group of 'underachievers' but to a much more general pattern of low performance. 'Under-achievement' is widespread and not restricted to a few individual children. This suggests that in EPA schools it is not sufficient to provide remedial help for a small group: there should also be a wider strategy for tackling low standards of performance, and this should begin at the preschool level.

Methods and materials: the role of the teacher Structured reading programmes for different age groups of poor readers can have considerable impact on reading levels. A variety of programmes and methods may be appropriate for different groups. Structured programmes can be a strong source of support for teachers by providing them with sequenced materials and a structure to work with. The teachers welcomed the new materials. In general, they felt that existing materials available to them were inadequate, poor in content, insufficiently graded or stuctured, and often irrelevant to the needs of the children. While it is often argued that sufficient good quality material for poor readers does exist, it is certainly the case that such material fails to reach the teachers who would like to use it. There is also an argument for a steady flow of new materials to stimulate teachers and to keep what is available up-to-date. Some of the most successful materials in the projects were specially designed for particular groups. This suggests that more information about available material should be published, and that careful thought should be given to the needs of particular groups and localities, rather than

nationally standard material.

The findings stress the role of the teacher as the most important single factor in the success or failure of any particular programme. It is unrealistic to assess a programme without taking into account the role of the teacher in the classroom. Experience with materials designed to be 'teacher-proof' with strict sequencing and reliance on special equipment merely underlines the dependence of any programme on the interest and ability of the teacher for successful implementation. Programmes developed by the class teacher with suitable back-up material and specialist support, had a far greater chance of success than a package adopted by the teacher without enthusiasm or programmes implemented without involving the class teacher.

Teachers and training

Junior teachers in the EPA project schools felt that their training had left them inadequately prepared for the kind of problems they faced in EPAs, and in particular for the teaching of reading. They welcomed any help they could get. This has strong implications both for initial training and for inservice training. The introduction of structured programmes into the classroom, together with back-up specialist help, is in itself a powerful form of in-service training for the classroom teacher. The opportunity to experiment with different forms of grouping and with new methods and materials, as provided for instance by the small group 'intensive courses' in the West Riding project centre, is another form of in-service training.

The involvement of students in the implementation of a programme in the classroom is a valuable element in initial training. Similarly, students can be involved in the small group situation. Colleges of education should recognize the value of such practical involvement in learning skills, and the need to reorganize college timetables where necessary.

Specialist support

Specialist help is often taken to mean the remedial teacher attached to the school. While extra help to work with individual children or small groups is always welcome, frequently

the remedial teacher himself would benefit from more training. Here again the introduction of special programmes with the help of outside specialists as in the West Riding can provide in-service training for the remedial teachers.

The presence of specialist help can be of key importance in backing up the classroom teacher. It should be the specialist's role to help the teacher by providing information on materials, advising on their use, helping work with difficult children, and more generally co-ordinating reading work throughout the school. Organizational arrangements between the classroom teacher and the specialist teacher varied, but the most successful arrangement was found to be the situation where the classroom teacher implemented the programme with support and advice from the specialist where necessary. Specialist support is an essential element in the in-service training aspect of reading programmes. There was a great need for more 'manpower' in the schools to work alongside the teacher in the classroom, to work with small groups, to listen to children reading, to check the use of equipment, to assess work, to take part in the reading games and other reading activities, and to prepare materials. Sometimes students could fill this role. This should not be thought of as 'untrained helpers', but as a team of helpers working together with the teacher to provide a context where small group work and individual attention was possible.

The concept of the 'resource centre' ties together a number of different threads in this discussion. 'Resource centres' would cater for a very local 'priority area'. Their role would be to act in support of local schools, to store and disseminate information on learning and reading problems and on the various programmes and materials available, to provide specialist help for the schools, and opportunities for in-service and initial training. Specialist staff would be attached to the 'resource centre' and would be responsible to the head of the centre. They would work part of the time in the local schools, alongside the teacher in the classroom, demonstrating materials and methods and working with the children with difficulties. Part of the time they should work in the centre itself in the in-service training workshops for local teachers. Part of their

time would obviously be spent in the centre co-ordinating their own work as a team and planning approaches to the problems.

Pre-reading skills

Structured pre-school programmes were effective in developing language and wider cognitive skills. Programmes which take into account the child's own language acquisition and production instead of depending on rote learning and repetitive language drills are more suited to the needs of young children in this country and its tradition of nursery and infant school work. Pre-school programmes should be developed to suit the local context.

Parental partnership

Involvement of parents in the work of the school is feasible and has an effect on parents' attitudes to education. Parents play a crucial role as educators of their children both in the school and at home, in partnership with the teacher. Home visiting programmes were highly effective in enlisting the cooperation of parents and building up their confidence in their role as educators. A historical parallel can be drawn between the health visitor, who was a crucial agent in educating parents in modern hygiene and infant care in the early years of the century, and the 'educational visitor' whose role is to encourage parents to become aware of the critical importance of the child's early experience at home. The educational climate of the home is the most essential factor in the development of the child's attitudes to learning and his cognitive and language skills in the early years. The parent as teacher is a neglected and under-used resource. Ways should be explored of raising the educational level of the home and the community, by helping parents to reinforce the child at home with suitable materials and encouragement, and by involving parents in the work of the school.

Summary of recommendations

A national survey in priority areas is necessary to provide information on reading standards in EPA schools.

A policy of 'priority allocation of resources' for those schools

worse off in terms of reading standards should be based on the results of such a survey, or surveys.

A variety of programmes designed to raise low levels of performance should be considered.

Structured reading programmes should be designed and implemented for the particular needs of poor readers.

Teachers should be encouraged to develop and use programmes with their poor readers, backed by specialist support and advice.

The initial training of teachers for all age groups should include the teaching of reading.

Colleges of education should consider the attachment of students to schools for individual and small group work related to reading.

More in-service training in the teaching of reading should be provided.

Specialist help should be available to work with the class teacher in the introduction of structured programmes.

'Resource centres' should be set up to serve groups of priority schools, by providing information on available materials, specialists to work in the schools with the teachers, in-service training workshops. They should play a key role in in-service training and initial training, in the dissemination of existing materials and the development of new material.

Structured pre-school programmes suitable for use in this country should be developed and implemented.

The role of parents as educators should be recognized. Ways should be explored of involving them in the work of the school and encouraging them to help the child to read.

Remedial education: programmes and progress

Home visiting should be carried out by teachers as an aid to the understanding of home background and to reinforce the work of class teachers.

Another form of home visiting is work with parents and very young children on a regular basis to raise the educational climate of the home. Further experiment and development of this type of work is required.

6 Teaching a special class in an ordinary school

P. S. Roseblade

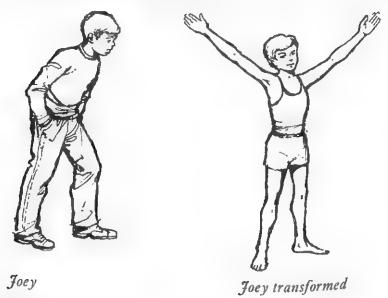
Teaching a special class of seven-year-olds in a normal school can be intensely irritating, exhausting, heartrending, very interesting and a frequently amusing experience: but it is never dull. The teacher's role in such a class is a fairly demanding one for it is a mixture of those of parent and teacher.

Some of the parental duties the teacher is required to assume are straightforward enough. A small group of children will need to be toilet trained and taught to cope with buttons, pressstuds, zips, ties and shoe laces. They have to be helped to recognize the back and front of a garment; that it is no use thrusting your head and both arms through one armhole in a vest; and that, if shoes feel uncomfortable and look wrong, they are on the wrong way. Much of this teaching comes into PE, dance and games. The first few such lessons of thirty-five minutes each are taken up by ten minutes undressing, twenty minutes dressing with a quick run-round and a couple of jumps, sandwiched in between. These lessons do resolve some worries, for example the command 'Stretch up' revealed that Joey's habitual cringing slouch was not a deformity but lack of a belt for his trousers. Such lessons too, give occasion for rejoicing: the whole class joined in congratulating Johnny when he at last learnt to throw a ball. His first attempt was pure farce as he took an incredibly long run-up, followed by a tremendous throw forward. Then the ball went backward and Johnny fell flat on his face.

Most of the games teaching is concerned with individual skills, for it is not really wise to attempt team games when the only form of cooperation is playing 'horses'. The only attempt at cricket with a small group failed, although it did show that the children imagined the batsmen must be prevented from making a run at all costs: so, while most of the fielders lined up to hide the wicket, the remaining two brought the batsman

down with a fine rugby tackle.

The other parental duties a teacher needs to perform are obvious. Some children need to be taught the use of a hand-kerchief, to wash, and occasionally even to turn the knob on a door before attempting to open it. The teacher may need to teach safety and property rules as well as good manners. How to use a dustpan, rather than sweep the dust behind a conveniently placed cupboard is necessary, but the most important duty is that of teaching speech.



Language problems

The poverty of language, both in vocabulary and in the comprehension and use of grammatical structures, is one of the main problems in teaching these children. Story time then, is one of the most important lessons every day. Books are chosen that have large, clear illustrations on every page so that the children, sitting in a group, can see, listen and comment as the story progresses. The children then illustrate the story and dictate sentences. These lessons are an attempt at the atmosphere of the bedtime story, followed by a version of infant news. These dictated 'stories' progress from a one word sentence, or silence, to three or four sentences, using in an encouraging number of instances, such words as 'because, under, behind, when' and 'if'.

These encouraging signs are offset to some extent by the paucity of the language and lack of experience revealed by lessons of this type. For example, a grapefruit is a 'big yeller orange'; a teenager is someone, 'old enough to make the tea'. When bread making there should be a 'star in the yeast'. A story about a hen laying eggs led to the enquiry, 'Who laid me?' which provoked the scornful reply, 'Babbies ay laid – they'm borned'.

The enemy of the teacher is 'thingy' language. A 'thingy' can be anything from a spoon to an ostrich but, although the teacher finds this language puzzling, the children show surprising understanding of it. On one occasion a messenger came to ask for, 'the thingy in the thingy on the blue thingy by the other thingy please?' Three children sprang up to fetch the 'thingy' which proved to be the glue pot in the cupboard on the blue box by the crayon tin.

The change in the book case

However, despite this, the language programme does get results. The most obvious consequence is the change in the appearance of the book-case. A frantically untidy book-case gives pleasure to the teacher, for books, instead of standing neatly in rows are constantly in use. Reading and writing become matters of interest and, while reading ages do not rise appreciably for some time, the desire to read is established and can be built on in later classes.

To further the progress of reading and writing, tracing can be done, but some children need to scribble, with fingers in sand or paint, with crayons, pencils or brushes, merely to become familiar with the tools, for when a child persistently attempts to use the blunt end of a pencil, the first essential is to teach which end makes the marks.

Visual discrimination material can be very useful but only if the children are given the words to use in discovering pictures that are the same. Odd man out games, i.e. picking out from a row of ducks, the duck swimming the wrong way, can be played from the blackboard thus eventually drawing attention to the correct way to write, e.g. b, d or s. These games bring in and use such words as, 'top, bottom, under, over, left, right,

tall, short, circle, square, star', etc., and can also provide a useful addition to the number language programme.

Providing language and experience for the development of mathematical concepts is highly important for, if only one child can conserve number at the beginning of a school year, much needs to be done. This lesson brings in many toys and activities but the teacher's job of providing the relevant vocabulary can be side-tracked by the necessity of preventing a few children monopolizing the sand tray, the balance or the water table, and by the necessity of involving all the children in purposeful activity.

The child who sits and stares, cringing if he is asked to work with sand or water, "cos I might get dirty", and is horrified that the children are 'touching' toys, counters and shapes, is as difficult to involve as the child whose only use for building blocks is to wait until his neighbour has built a castle and then smash it. Such children have to be taught to play before the experiences and language offered can be of any value to them. Eventually though, these activities do pay dividends and understanding develops. It is a delightful moment when a beaming child holds out a 'Story of Six' card, using the four rules, and says, 'Please Miss, you're tricking me. They're all the same'.

The most demanding children are those who are emotionally deprived or disturbed and it is the most exhausting of the teacher's jobs to provide the affection and attention they are seeking, while preventing them from monopolizing the teacher



entirely. It is difficult indeed to comfort a child who throws himself into the teacher's arms sobbing out an incoherent story of a family row - how he walked the streets for what seemed to the child to be hours, with mother, fearing the imminent arrival of the baby, looking for a place to sleep. The consequent behaviour pattern is not always easy to accept: when the child provokes two fights, breaks the pencil sharpener, knocks down the Wendy House, sticks silver merit stars across his forehead and announces, 'The doctor says I'm a nervous wreck', the teacher may be forgiven a somewhat hysterical laugh.

Special class - special problems

Teaching a special class in a normal school involves, above all, giving the children the language with which to think, the experiences to provoke thinking and so structuring these experiences that the children are successful in thinking for themselves. The children are far too prone to underestimate themselves, for it is easier to ask for an answer than think out the problem. However, it is essential that the teacher does not accept this attitude but discovers and provides something in which each one is successful in order to build up their confidence.

The path to self-confidence is never smooth and the teacher may feel overwhelmed by the setbacks caused by petty theft or wanton damage. Building up the confidence of a child, who declares, 'Honest I ay 'ad the crayons', as crayons slip gently on to the floor from his trouser leg, is not easy. The teacher may feel justified in demanding, 'Who bit the harvest apple?" and be tempted to denounce the deed in very forcible terms, for after all there was only one; but such incidents shake the confidence of both teacher and child. On the other hand, when Jim, who a year ago was unable to speak comprehensibly, confidently and clearly tells a visitor, 'We're all best at something you know', their confidence is restored.

Multiple handicaps

Classes of this kind, special, backward, call them what you will, contain children with many handicaps. There are those

Remedial education: programmes and progress



with speech problems, maladjusted children, perhaps a spastic child, in addition to those who have been absent from school for long periods because of illness, exclusions or for other reasons: for example, the child who had rarely been seen at the infant school because, 'She can't hear so what's the use of sending her?' Then there are the children who wear glasses, or should do but, 'forget' them, break them, or even have parents who do not want their child to wear them because they 'Don't believe in glasses'.

Many of the children come from large families. Some of these are loving families, some are families with problems and some are problem families. These children, sharing adult attention and monetary resources at home, need to be in a small class in a suitably equipped room at school. It is the size of such classes in the normal school which makes them vulnerable. They are vulnerable to the argument that, since they are small, disturbed children from the ordinary classes can be more easily contained. The argument has its merits for the teacher of a class of forty children. However, slow learning children seem particularly susceptible to the infection of disturbed behaviour; or even if they resist it, can be robbed of the necessary adult attention; so the teacher does not welcome such additions.

These classes are also vulnerable to short and long staff absences, for it is obviously easier to split up a small class than to do the same to a large one; and where normal classes are already crowded, even one less can ease the problem of space.

They are especially vulnerable to shortage of staff for the same reasons. If half or all of the children from, for example, four special classes, form part of the ordinary classes during times of staff shortage, the adult-child ratio is unfavourable and the problem of equipment being shared between, say, nine classes. makes provision of suitable materials difficult and costly. However, given sufficient staff and reasonable luck in the matter of staff absences, the special class in the normal school has two advantages. The first of these is ease of promotion for children whose attainments are low because of illness, emotional difficulties, etc., but who can and do blossom in the small class. This is an advantage; but more important is that the children are not divorced from their normal environment. They come to school with brothers and sisters. They have cousins, possibly even uncles and aunts, nephews and nieces at school. The faces of the children in the class are familiar for they went to the same infant school. The teacher's face may be the only one that is unfamiliar.

The teacher knows many of the parents, perhaps grand-parents; has taught the older children in the families and so is aware of their strengths and the problems the child may encounter at school and at home. All this gives both children and teacher common ground on which to build good relationships. This is most important, for if the relationships are good, teaching a special class in an ordinary school may be exhausting, irritating and sometimes heartrending, but it is also interesting, amusing and far, far from dull.

7 Parental involvement schemes

R. A. Broome

Professor Blyth in his introduction to the National Conference at Edge Hill College in June 1965 began with the following words: 'Teachers have always recognized that close links between home and school are important. So have parents. So have administrators and Education Welfare Officers and child care workers' (Craft et al., 1967, p.3). Although I wholeheartedly agree with the sentiments expressed regarding the necessity of a partnership between home and school, I feel that the assertion that teachers, parents and administrators have always recognized this is rather misleading. I find myself more in agreement with Dr Eric Midwinter who, in giving a talk to a group of experienced teachers and students in the Harrison-Jones School, Liverpool, said 'For many years we have believed that the school educates the child and the home gets in where it can. It is time we all realized that the reverse of this is true. The home educates the child and the school gets in where it can'. However, whether we accept as correct the first or second presentation of 'the facts', there is a wealth of evidence to support the idea that programmes of parental involvement are essential to a school's success. In this article I intend first to examine approaches to parental involvement that have been suggested or tried and secondly to explain how I would try to improve the quality of schooling by endeavouring to involve whole families in the education process.

The Plowden Report places great importance on the involvement of parents in their children's education. It states (p.37) 'that one of the essentials for educational advance is a closer partnership between the two parties to every child's education'. Thus the home and school working together can achieve far more than either party working alone. The report makes the following recommendations regarding the participation of parents:

- 1. All schools should have a programme for contact with children's homes to include:
 - (a) a regular system for the head and class teacher to meet parents before the child enters;
 - (b) arrangements for more formal private talks preferably twice a year;
 - (c) open days to be held at times chosen to enable parents to attend:
 - (d) parents to be given booklets prepared by the schools to inform them in their choice of children's schools and as to how they are being educated;
 - (e) written reports on children to be made at least once a year; the child's work should be seen by parents;
 - (f) special efforts to make contact with parents who do not visit schools.
- The Department of Education and Science should issue a booklet containing examples of good practices in parentteacher relations.
- Parents should be allowed to choose their children's primary school whenever this is possible. Authorities should take steps to improve schools which are shown to be consistently unpopular with parents.
- Primary schools should be used as fully as possible out of ordinary school hours.
- 5. Heads should have a say in the evening use of their buildings. When buildings are heavily used two deputy head teachers should be appointed, one responsible for out of school activities. This would involve a modification of the Burnham provisions.
- Parents and other adults should be invited to help the school with its out of school activities. Parents might contribute towards the cost of out of school activities, to supplement the costs borne by the local education authorities.
- Community schools should be developed in all areas but especially in educational priority areas.

The booklet Parent Teacher Relations in Primary Schools, issued by the Department of Education and Science, gives examples of how some of the Plowden recommendations can

be put into practice in schools. It describes how a relationship between parents and teachers can be gradually built up from a child's earliest years. Chapter 1 tells us how in a good nursery or infant school parents are encouraged to visit with their children well before admittance day. Parents are contacted by letter and invited to look around the school with their children and when the time comes for the child to attend school they are encouraged to stay for as long as is needed for the child to be fully settled in. Parents are encouraged to bring any problems to the head teacher and are received and treated sympathetically. During the child's first few years at school, events are organized which involve parental participation such as a Harvest Sale, Christmas party or a special 'Fathers' night', and mothers are encouraged to visit the school and help in class-room activities.

Booklets and letters can be used to foster good parentteacher relations. Parents of new pupils can be given an introductory booklet detailing school aims, names of staff, arrangements for meals and other helpful information. Chapter 2 also explains how letters of thanks for cooperation, letters of guidance regarding secondary selection procedure, or informal invitations to attend school to see some outstanding piece of work by their child can encourage parents to feel part of the education process. Maintaining contact (Chapter 3) can be accomplished by school newsletters but more importantly spontaneous visiting can be encouraged. In connection with this a 'sitting area' for parents can be provided where they can see what is happening in the school, or coffee mornings can be arranged. Open days, formal interviews and written reports on children's progress also help to keep both parties informed on children's development. Parents who are difficult to involve may be approached by home visiting.

Many parents are most willing to help at school. They can be employed in assisting teachers in the classroom or on the sportsfield or in after school clubs and activities, or in raising funds for some school project. Many fathers are willing to help practically in the building of some piece of equipment or apparatus such as an aviary.

Lastly, a formal Parent-Teacher Association may be useful

in some schools. In middle- or upper-class areas such an association can give great benefit to a school (although there is a danger of it becoming 'a rather formal money-raising concern') but in working-class districts it may be virtually taken over by a handful of parents who have white collar jobs and are used to attending meetings and making decisions.

An important factor when considering schemes of parental involvement is the 'harmony' between the home and the school. 'Teachers must be constantly aware that the ideas values and relationships within the school may conflict with those of the home and that the world assumed by teachers and schoolbooks may be unreal to the children. There will have to be constant communication between parents and schools if the aims of the schools are to be fully understood (Plowden Report, vol. 1, p. 51).

Dr Eric Midwinter in Liverpool suggests that his home-

school relations programmes have two main factors:

(a) An attempt to place the parent in a learner situation so that he can understand the educative process, and

(b) An attempt to find 'natural social loci' for that situation. (Midwinter, 1972, p.164.)

He defines the logical progression of home and school relations as:

- The publication. In Liverpool an informative interesting cover was produced entitled 'Back Home', into which individual schools could incorporate their own newsheet. There was also Solly, magazine of Salisbury School.
- The exposition. Labelled displays of children's work were mounted in places where people were bound to notice them, such as in supermarkets, cinemas, race courses and libraries, etc. Children were involved in demonstration lessons in a large central store.
- 3. The site improvement scheme. Children and teachers demonstrated their intention to look critically at their surroundings. Play-grounds were landscaped (partly by parents) and murals were painted.

4. The parent in the process. Parents were involved in work with children on projects, and attended coffee mornings to view education 'actually happening'.

Midwinter has succeeded, I feel, in one important respect. By careful choice of parent-participation schemes he ensured that success was virtually guaranteed. It is generally acknowledged that a successful teaching programme starts with what children know and progresses from there. In considering parental involvement programmes similar principles apply. We must initiate schemes which are so in tune with the neighbourhood that people will naturally and unselfconsciously become involved in them, because they arise out of an aspect of their daily lives. It is no use thinking up grandiose schemes which find no echo in the supporting community and then complaining when these fail.

Blyth (Craft, 1967, p.10), illustrates this point in describing 'the Head who tells us that his parent-teacher association is useless, because the parents he really wants to get at do not come, but who seems unaware that it is exactly the suspicion that he wants to get at them that keeps them away. It is necessary to be more subtle and also more persistent, than that'. Blyth goes on to say 'we have to remember that in this situation it is the teachers who are the professionals and it is legitimate to expect them to take the major initiative'.

In outlining a programme of parental involvement in a primary school it is convenient to work under 'area' headings and describe various aspects of the scheme in relation to the headings.

Invitations and open days

From the outset I feel we should make it clear to parents that they are welcome in school at any time, so it follows that we must never find their presence 'inconvenient'. One way to encourage spontaneous visiting is to create a parents' sitting area, comfortably furnished with tea-making facilities, in a position where school activities and routines can be seen. It is most important that this 'welcome area' should not be hidden away in a corner, out of sight, or we are at one and the same time purporting to encourage visiting and 'isolating' the visitors. It goes without saying that parents should always be invited to concerts and performances given by their children, and this must include sporting activities such as football or netball matches and swimming galas. One type of

invitation which most parents will respond to is a sale or event organized by the children and 'hosted' by the children. A Christmas or Summer Fair which raises money for charity (or school fund!) and at which children have made or acquired items for sale is very popular.

Formal meetings with Head or class teacher

Once, or preferably twice yearly, parent interviews can be arranged where parents are able to discuss with the class-teacher or the Head the welfare and progress of their individual child. It is a good idea to fix times in advance so that a system of appointments can be drawn up, thus avoiding a situation where many parents are kept waiting. In the interviews the teacher should consciously emphasize the child's strengths not weaknesses, and allow the parents time to express their views fully so that there is a mutual sharing of knowledge about the child.

Under this heading we must include also other formal meetings which are necessary from time to time. Sometimes a parent has a complaint against the school or the child's teacher, or the Head must report some serious misdemeanour to the parent. These are best dealt with in a brisk, businesslike but friendly way and need not ruin a home school relationship.

Written reports

Once annually, I feel, parents are entitled to a formal written report on their child's progress and development. However, this should emphasize the child's strengths and achievements rather than his weaknesses and failures. Phrases such as 'Could do better' or 'Satisfactory' mean nothing. A much better way of communicating is by letter or even informal note. These may be sent out at any time and always tell of some specially good piece of work done by the child, coupled with an invitation to 'drop in and see it'. Parents are keen to see their children do well and the children are motivated to try hard if there is a chance that the work will be 'seen by mum'.

Parents need to know about any change in the administrative procedure which is to take place in the school and also appreciate information such as the dates of holidays, open days, etc., in advance. These matters should be attended to by the Head, and he should always include his thanks for parental co-

operation where this has been given (or where it will be needed!).

Pre-admittance communication

Before a new group of children are admitted to the school, or when a new family moves into the district and enquires about the admittance of a child, the Head (and staff) are in a position where they can sow seeds which will grow and blossom into worthwhile and meaningful relationships. At the outset he should make it clear that he encourages spontaneous visits by parents, and show them round the school in a friendly and welcoming way. There may be opportunities at this stage for the home-link teacher to visit each home to meet the family and convey a booklet stating the school aims, naming staff and other helpful information. Special introductory visits may be arranged where new children and parents can meet the class-teacher informally, and a well planned settling-in period evolved where the parent may accompany the child to school for several days if necessary.

Home visits

As mentioned previously, a good way to introduce home-visiting without difficulty is at the time of admittance. By seeing a child as a member of a family in a home, the home-links teacher can gain insights into many aspects of a child's behaviour in school, and pass these on to the child's class teacher. The choice of home-links teacher is important. He needs an ability to mix easily with all types of people, be sensitive to problems and atmospheres, and be a good listener. The families must see him as a friend – not 'the schoolboard'.

The home-links teacher may visit a home at the request of a child, a parent or a teacher where a problem has arisen or on his own initiative. He will probably be more concerned with families who are rarely seen at school, and try to reach out and support families who may be under stress. Occasionally, with great tact (and the families' agreement) he may inform social services of families where extra help is needed. Although he is employed by the school, I feel he should identify with the family.

The use of school out of hours

The Head should make it clear that the school is available to be used by parents or children in the evening (subject to permission from the LEA). Where there is a Parent-Teacher Association they should have free use of the building for their meetings, events and activities. If any group of parents and children need the school for the furtherance of an interest or pastime, the Head should do all in his power to accommodate them. In this way the school becomes a centre of the community.

Parental help in education

Once a good relationship has been built up with parents, they are often willing to help in classroom activities. Initially, coffee mornings or afternoons where parents are able to sit in the classroom and watch or help their own children at work, form a good introduction to parental involvement. Following this, it is likely that many parents, feeling welcome and accepted in the environment in which their children learn, will wish to help in the classroom on a regular basis. This position, if achieved, is extremely valuable for parent, teacher and child, for all benefit. The parent, in helping in the classroom, sees the educative process in action and can incidentally learn a great deal about how to encourage her own child; the teacher is able to spend more time with individuals or groups of children, and also gain a deeper understanding of her pupils' family backgrounds; the child is strongly motivated to work well, and has the opportunity of forming relationships, and interacting with adults other than his teacher.

There is no reason whatever why fathers should feel less at home in the classroom than mothers. However, many may feel that they prefer to help on the sportsfield, or in some practical project which wil benefit the children. Creating a garden area, constructing puppet theatres or animal cages, or accompanying two or three children on some survey of the district are valuable contributions which have the same 'three-sided benefits' previously mentioned. Mothers and fathers are particularly welcome on school or class visits ('educational' or 'recreational') where their presence can achieve smaller groups, and more educative interaction. Traditional festivals

(or newly invented ones!) can be sources of cooperation between parents and teachers, and can help the school to be accepted as a real point of the community. Much more can be done with regard to (for example) Bonfire Night, Pancake Tuesday or Mayday than writing and drawing. The Head and staff with imagination can initiate some enjoyable activities which involve all sections of the community and which will stimulate all concerned in such a way that educational experiences are integrated into, or closely follow the activities

Pupils out in the community

Sometimes parents and children may participate in the learning process at home in following some project started at school. If the environment is well used, or subjects are carefully chosen by the teacher, the child's whole family may become involved in a piece of research/learning at home. A subject such as 'What was it like during the Second World War?' is capable of development at home, with various experiences, descriptions, tape recordings, photographs, etc., being assembled at school as a consequence of work done at home. Adults enjoy reliving hair-raising or amusing experiences, and tell vividly stories which create a feeling of involvement in the child. Such a project which I initiated with a group of fourth year pupils (11+) resulted in an overwhelmingly large selection of mementoes being brought to school from ammunition boxes and medals to ration books, identity cards and respirators.

Local shops, stores and public buildings where parents and relatives of the children spend part of their time, may be approached to see if they will find a small area of display space which can be permanently allotted to children's school work. Displays of work may be mounted and changed regularly by either an artistically inclined teacher or helpful parent. The displays should be well arranged and varied so that they are attractive to look at, and create comment and discussion amongst customers.

One cannot conclude an outline of a parental involvement programme such as this by a summary – because the outline is itself a summary. It can only be worked out in detail in relation

to a particular school by a particular Head and staff. One point should be borne in mind continually, however. 'Professor Wiseman argues convincingly that home variables have, pro rata, twice the weight of "neighbourhood" and "school" variables put together when correlated with educational attainment' (Halsey, 1972, p.10). It is therefore, of the utmost importance that a great deal of thought is given by particular Heads in particular schools with regard to the organization and implementation of programmes of parental involvement.

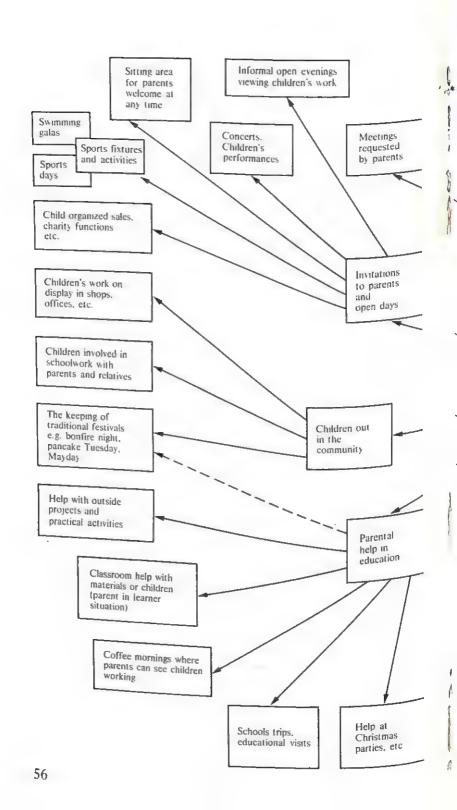
Figure 7.1 shows, in diagrammatic form, a quick reference sheet displaying all areas discussed in this essay. It is a well organized plan of action which will be of immediate use in a school situation. (See pages 56–7.)

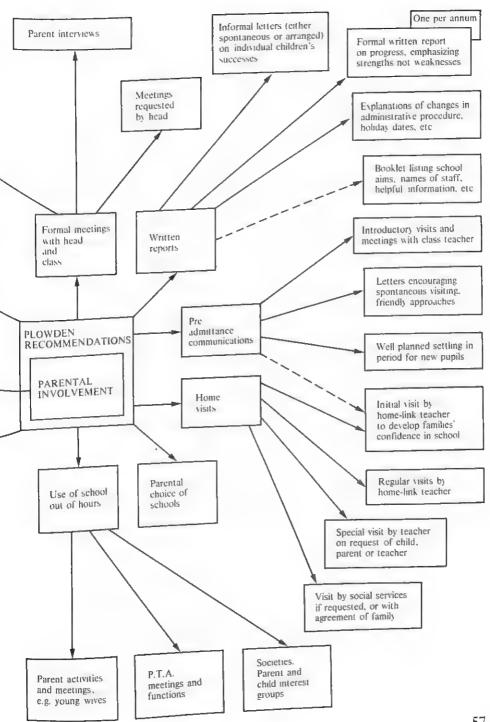
References

- CENTRAL ADVISORY COUNCIL FOR EDUCATION (1967)

 Children and their Primary Schools. Volume 1: The Report. Volume 2:

 Research and Surveys. HMSO.
- CRAFT, M., RAYNOR, J. and COHEN, L. (1967) Linking Home and School, Longman.
- DEPARTMENT OF EDUCATION AND SCIENCE. Educational Priority, vol. 1, HMSO.
- HALSEY, A. H. (Editor) 1972, Educational Priority, vol. 1. Department of Education and Science, HMSO.
- MIDWINTER, E. (1972) Priority Education: an account of the Liverpool Project, Penguin (Educational Special).
- MIDWINTER, E. (1972) Projections: an educational priority area at work, Ward Lock.
- PLOWDEN REPORT (1966) Children and their Primary School: a report of the Central Advisory Council for Education, HMSO.





The organization of remedial education services

It is necessary to consider the practical implications of this broad view of remedial education. Many local education authorities have established remedial education services; a pattern has begun to emerge with the hierarchical structure suggested in Brennan's paper (9: p.71) modelled on a number of existing services. It is certainly a practical solution to the career problems encountered by well-qualified teachers who commit themselves to peripatetic life ('teaching out of the boot of a car', it has been called). The present writer has vivid memories of teaching in cloakrooms, on landings, in one half of a 'medical room', in the corners of classrooms; perhaps none of us has, until recently, created enough fuss about these conditions. In 1965 it seemed possible that these programmes could offer 'solutions'; in 1975, though many points have been accepted and developed by particular LEAs, the goal of truly adequate provision for individual children seems as remote as ever. It seems increasingly unlikely that much will be accomplished through a continuation of the search for instruments which separate children into self-fulfilling categories; yet this has been a tendency in remedial education and is likely to be given fresh impetus (the British Psychological Society is giving much publicity to the new British intelligence test). Huge publishing programmes are being implemented, involving very elaborate attainment tests with standardized norms; at the same time educational psychologists trained in a strong psychometric tradition, are occupying commanding heights in special education. They would do well to listen to the warnings about the possible

effects of such segregation – still better to work for more good schools, less futile expenditure of energy on internecine strife. All these matters were considered in a cool and helpful manner by Dr Philip Williams (8, p.60) as long ago as 1968; his view that 'ascertainment should be as informal as possible and as far removed from the element of legal compulsion as is possible' holds good in 1975, and has received recognition in new procedures sanctioned by the DES. Local Education Authorities have frequently set out their role in a manner which is inimical to the individual's dignity and wellbeing.

The fact is, we have not been thinking enough about the process of education. Remedial education services can only too easily become a smoke screen behind which an LEA hides a lack of commitment to measures of change. Mason (10: p.83) asserts that the role of the expert remedial teacher can be, and should be, much more diversified than it currently is. Working through example rather than by formal advice, good remedial teachers can provide the leadership needed in breaking down 'the sterilized impersonality, the mask-wearing, that teachers get from years of subject-centred class-teaching'. They do not nag away at weaknesses but develop a personal relationship which allows of respect on both sides, 'finding worth in children when others disrespected, seeking the strengths in a youngster which could be used to overcome the weaknesses'.

A. C. Nicholls: Dr Williams, I should like to begin by thanking you for this opportunity. It seems to us, that you have raised a very fundamental issue by your distinction between those children who are organically impaired and those with environmental handicaps. You would, I think, like to see schools specializing in different approaches to deal with these very different learning disabilities?

Williams: I think that you are possibly attributing to me a point of view which is too developed. What I would very much like to see would be more experiments with schools specializing in different approaches before one took the step of establishing special schools with special approaches for the two groups of children that you mention. I think at the moment we are still very much in the experimental stage and it would be wrong to take a step which would affect our whole policy of dealing with educationally subnormal children without more investigation and

Nicholls: What is your feeling about ascertainment? The criteria as reviewed by you seem far from uniform as between one Authority and another. Would you favour some kind of standardized procedure, an extension of the present 2 HP and 3 HP procedures or do you think an unfair burden is placed on

Williams: Well, I have strong views on ascertainment! First of all, I would think you are right that there are variations in criteria between one Local Authority and another and indeed to some extent variations within the individual Authorities. I am not in favour of a standardized procedure, because I think standardization in the past has implied a kind of rigidity based on a legal interpretation of ascertainment, which we all know to be old fashioned and unnecessary. ASCERTAINMENT SHOULD BE AS

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INFORMAL AS POSSIBLE AND AS FAR REMOVED FROM THE ELEMENT OF LEGAL COMPULSION AS IS POSSIBLE I think the 2 HP and 3 HP procedures are extremely useful in that they point very clearly to the areas which need studying before decisions are taken about the sort of special education which it is important for a child to have, but I, personally, am not happy about them remaining in their present form. This view is not, of course, unique - Dennis Stott is one of the people who has criticised the lack of validation of the questions and the items which appear in the 2 HP and 3 HP procedures. The sorts of information to which these procedures alert us are of great importance and it is for this reason that when vou asked your last question about an unfair burden being placed on school medical officers, I am not sure that I would like the word 'burden'. I think it is essential that school medical officers participate in the evaluation of a child's assets and deficits before a decision is taken about the right form of special education. I'm not quite sure whether the participation of the school medical officers is at the moment directed towards the right areas. Many people agree with the view that school medical officers are sometimes too concerned with matters which are purely educational, but I certainly feel that at the moment the school medical officers are essential members of any team which is concerned with ascertainment of handicapped children.

Nicholls: One further point here: the last section of the 3 HP form asks head teachers of primary and secondary schools to recommend a special school. Do you think this is irrelevant in that I think many of them may not know what special school really entails?

Williams: No: personally I am for a team approach and the picture of a head teacher sitting in a room, filling in a form about a child and then sending this off to a remote and rather distant education office is, I think, something which ought to change. There should be personal contact. A group of people sitting around a table talking about a child with the head as a member of the panel and with the opportunity to voice his views is a much

¹ New forms and procedures have now been adopted.

healthier picture. It may be that the head doesn't know ENOUGH ABOUT THE SORTS OF SPECIAL EDUCATION AVAILABLE: THIS IS NOT AN ARGUMENT FOR EXCLUDING HIM, IT IS AN ARGUMENT FOR INVITING HIM.

Nicholls: Your discussion of retardation and backwardness is, of course, of great interest to us, as also your mention of remedial education. Your statement of the intent of remedial education would not cover more than a minority of activities undertaken by remedial services: you state 'nearly all the work in remedial education is concerned with infrequent attendance (rarely more than one hour a day and usually less) of above average children'. This sounds like the old style of remedial work - pre-Pidgeon and Yates. Few of us would now feel that this was at all an adequate account. Perhaps you would care to comment on your sources of information and your views of what direction remedial education should now be taking?

Williams: I think this is to some extent a question of definition. I am perfectly ready to accept the redefinition of remedial mork to include full-time remedial classes for below average children. But I would then begin to question the ways in which these fulltime remedial classes for small groups of children differ from fulltime, slow-learning classes or opportunity classes or whatever name is given to this type of provision. There is a lot of confusion over the nomenclature of the different sorts of special education of which remedial education is one example. In our area remedial education usually refers to daily, small-group work, with children in the average ability range.

Nicholls: In a previous journal, Mr Gulliford has made a comment on the need for special schools and special classes. Where there are certain withdrawal classes in school and you have a group of these in a particular school covering a number of children, he says that this becomes, in effect, a small special school. This is a part of remedial education, isn't it?

Williams: I think there is a sort of range here. At the one end you have two or three children in a class needing some form of special help with the class teacher being the person who can very often take this in his or her stride. At the other end, you have children whose difficulties really need a specialist class organized by a school psychological service with a psychological basis to the treatment. This is, I would say, the work of the school psychological service. In between this, you have a range of different activities and of different responsibilities and I wouldn't like to pronounce on the best way in which any one LEA can decide how its own provisions can be established and organized. I think it's a question of the facilities and the personnel which are available to individual LEAs.

Nicholls: Despite all the research evidence in favour of early ascertainment (Kellmer Pringle in 11,000 seven year olds, for example) you found that fewer than 5 per cent of the special school population was under eight years of age. Two questions here: Why? and how would you effect changes?

Williams: I think old attitudes die hard. I remember being taught that no child could be ascertained or 'found out' as being educationally subnormal until he or she was at least seven, because it masn't until they had been two years in the educational system that you could find out that they were two years backward! This is an attitude which current work, with its emphasis on early ascertainment, deplores. You quite rightly quote Kellmer Pringle - and there are other authorities too - who would argue very strongly in favour of early intervention as being most effective for influencing the development of children who are or who are going to be slow learners. The old attitudes are at the moment still with us, and people are reluctant to bring forward children as being in need of special help until they're not only seven or eight, but in many cases nine, ten or eleven.

Nicholls You have two extreme attitudes here: 'Let's wait and see if he comes on'; at the other extreme, 'these children should be followed through from birth on an "At Risk" register?'

Williams: I am not sure that your two points are necessarily 63 antitheses. I am very much mith Tansley when he argues for going along from an 'at risk' register. I'd like to see an '.4t risk' register which is connected with risks which are social and psychological as well as risks which are mainly medical; and it is as a development from a register of this sort that I would see longitudinal work with handicapped children proceeding.

Nicholls: Would you amplify a little on widening the 'At risk' register to include social handicap. This isn't normally included at the moment, is it? and you still have a very high number of children if you take all the children born 'at risk?'

Williams: Yes. I am very interested indeed to hear of some work which is being done by Heber in Wisconsin. He is concerned with the possibility of compensatory education for young children. In his case he's taking children not at the early infant or nursery stages, but children at birth. He's drawn up a set of 'at risk' families who live in extremely poor areas of a Mid-Western town and he's arranging for people who rejoice in what I think is the lovely name of 'infant stimulators', to go into the homes for several hours a day from birth onwards. They play with the children, talk to the children, develop their language and try to improve their relationships with adults by giving them more adult contact than they would otherwise get. When the children are six months of age or thereabouts, they are going to be moved to a nursery group for several hours a day and again they mill get more contact, more play, more social activities in this setting. The point I am making is that here we have children who are 'at risk' because of the social background in which they are growing up and in this experiment there is an 'At risk' register, as it were, which is drawn up from birth onwards. Now I am not suggesting that at the moment this is something which is practicable to carry out on any large scale. But it is a research approach which will certainly help us understand any advantages which may reside in constructing 'At risk' registers of children from homes which are impoverished socially and for whom we need to provide compensatory education. It may be that you could regard this as early remedial education and in a sense I think this is what it is.

Nicholls: Are these people prepared to accept this additional stigma?

Williams: I would have thought that for an overpressed mother the opportunity of someone to come into the home to play with one of her children would be something which would be regarded as possibly more of a heaven-sent opportunity than a stigma.

Nicholls: This varies, doesn't it? Some people take a violent dislike to any sort of welfare agency.

Williams: I agree.

Nicholls: Do you see any prospect of a useful screening technique to identify potential ESN pupils? What of the Benton Visual Retention Test? Are these children marked out by difficulties in performing visual motor tasks?

Williams: I am glad you asked this question because it enables me to say something with which we are very much concerned at the moment. The research project in compensatory education with which we are engaged in this department has one section which is concerned with identification techniques. We are trying to see if it is possible to establish techniques which will enable us to identify, at the time of entry into the infants school, those children who will later obviously be in need of special class or remedial work by virtue of their poor adjustment to school and their poor performance in the school situation. Other sections of the project are concerned with developing teaching programmes for these children. These are tasks on which we shall be able to say more in two or three years' time, when the research is a little bit further along the line, but we would certainly very much like to see the identification of children needing special help of any sort much earlier than is the case at the moment.

Nicholls: Kirk's test – the Illinois Test of Psycho-linguistic Abilities. Do you think this is on the right lines? Is this the sort of programme the new special school should follow, backed up by such material as Frostig's Visual Perception

Remedial education: programmes and progress

Programme?

Williams: I think this is one of the more useful techniques which have been developed in recent years. The Frostig Test of Perceptual Development is another example of a new assessment technique which will suggest approaches to education with individual children, more profitable, more direct and more helpful than has been the case hitherto. But I would like to see much more than a reliance on one or other assessment technique and one or other special programme.

Nicholls: If we could identify them early, do you consider that the emphasis ought to be switched from older to younger children? If this did happen, do you think the new category of socially handicapped would be better served by special provision within ordinary schools, leaving the special schools to deal in the main with the organically impaired?

Williams: In General, all Handicapped Children are Better Placed in the Ordinary Schools, if this can be arranged. Obviously we all know that, for a variety of reasons, it cannot be so arranged in all cases. But to answer your question specifically: I certainly go along with the attempts to deal with the socially handicapped by special provision in the ordinary schools. This is, after all, what Plowden and the EPAs are all about.

Nicholls: Is it likely that a substantial proportion of the children who come to us as remedial teachers are suffering from some kind of minimal brain damage? It is sometimes argued that so-called dyslexia is associated with brain damage, but you find that failure to benefit from the ESN school is most often found in children who are organically impaired, whilst those whose disability is mainly social tend to do better. It would seem to follow that our pupils come mainly into the latter category. Or do you favour a theory involving a specific reading disability. What are your views on the dyslexia controversy, in other words?

Williams: I follow Magdalene Vernon here. I recollect that in her book on reading she suggested that children's reading disabilities may be regarded as falling into one of three categories. She thought that there were children whose reading disability was associated with neurological and perceptual problems. Secondly, there were children whose reading disability was associated with social deprivation and thirdly those whose reading disabilities were associated with emotional difficulties. She felt that the last group of children would improve given psychological treatment, the second group of children respond well to remedial reading procedures and the first group of children would be those who pose problems. I think that all three types appear in our remedial classes and remedial groups, but the second, that is the children with social handicaps, are probably the ones who respond most readily. Now this is certainly the sort of finding which we noted in relation to special schools. If, however, we look at the research which has been done on remedial reading, I have a complaint because I feel that in very little, if any, of the research, has any attempt been made to break down the response the children have made to remedial reading in relation to the sorts of disabilities which the children show. I would very much like to see someone analysing some of his own experiments in terms of the response which children make to remedial reading and in relation to the sorts of difficulties for which they are placed in remedial classes. I think this would go a long way towards helping our understanding of what is going on in remedial groups. It would help to explain the rather conflicting results which, I think it is fair to say, are at the moment shown by research studies into the efforts of remedial education.

Nicholls: What particularly pleased us as readers of this research was its readability. The case histories recount the psychometric detail without jargon! Clearly a great deal of time, effort and travel must have gone into this section of the research. Would you care to comment?

Williams: Yes it was a time consuming bit of work and particularly Miss Gruber, who did the social work side of it, didn't spare

Remedial education: programmes and progress

herself at all in the work she put into this, collecting the material, seeing the mothers, etc.

Nicholls: What would you see as follow up?

Williams: I'd like to see much more attention paid to the different reasons why children fail in school. I'd like to see a mider realization that the term 'educationally subnormal' is only the beginning and not the end of the diagnostic process. I'd like to see more experimental establishments concerned with that group of slow learning children who have some form of neurological damage and of whom I think there are many more than me are at present aware. I'd like to see much more of the case conference approach in work with handicapped children. One more outcome which is particularly of interest to us of course is the need to identify children needing special education and to educate them much earlier than is the case at present. The recent researches in child development concerned with the effects of modifying a child's environment all tend to show that the earlier you can get in and do something about it the more effective your work is.

Nicholls: Would you care to comment on the special school versus special class controversy and the place of special schools in a comprehensive system in relation to all ten categories of handicap?

Williams: Special schools and special classes are I think complementary. The greater the variety of provision we have for handicapped children, the more effective and more precise can be the opportunities we provide. I also tend to feel that we sometimes are a little bit governed by administrative necessity or governed possibly by administrative views in the way we deal with handicapped children. I suppose it is necessary to have clearly defined categories of handicap. One of the points of course which we did touch on in the book is the extent to which children from special schools have multiple handicaps and it may be that we are too definite in saying that one child is educationally subnormal whereas another falls in a different category. Ought the categories of handicap to be revised, or even abolished?

Nicholls: Are we justified in feeling optimistic about the progress made in special education since the 1944 Act?

Williams: One can't help being happy about the progress which has been made if one looks back at the figures of children in special education in the 1940s and compares them with the very much larger number of children who are being given special education today. This isn't simply a question of there being a large number of children in need of special education - it reflects much more awareness of the opportunities of special education and much better identification. However, although we are happy about progress in special education, we are never satisfied. There are trends which make us aware of new handicap. For example, social deprivation has been very much the theme of the 1960s and we are now beginning to see improvements in the way we are trying to deal with this. We can look at maladjustment and feel happy that we have more provision for maladjusted children now than we had in the late 1940s. Yet as we learn more about the incidence of maladjustment in the population, the more we realise how inadequate are our present arrangements. We have done nothing, or very little, about the problems of children with summer birthdays. We know there are children with special sorts of language handicaps, of which we are only beginning dimly to be aware. While indeed me may be happy about the progress made we obviously still have a very long way to go before, if ever, we reach a state of satisfaction.

Nicholls: Thank you very much for your time. Is there anything you would like to add as a final comment?

Williams: I should like to congratulate your Journal on the initiative that you've shown in adopting what for me has been an extremely novel and interesting method of review!

GULLIFORD, R. (1968) 'A comment on J. R. Staple's article, "Should we

segregate ESN pupils?" Remedial Education, 3.1. PIDGEON, D. and YATES, A. (1969) An introduction to educational measurement, Routledge & Kegan Paul.

Remedial education: programmes and progress

- PRINGLE, M. L. K. (1967) 11,000 seven-year-olds, Longman, for the National Bureau of Child Care.
- VERNON, M. D. (1957) Backwardness in reading: a study of its nature and origin. CUP.
- WILLIAMS, P. and GRUBER, ELIZABETH (1968) Response to Special Schooling, Longman.

A policy for remedial education 9

W. K. Brennan

Introduction

'Remedial education' is an unsatisfactory term. It implies an education which 'puts something right', which in many cases it does: but it is often overlooked that even after their difficulties have been 'remediated', certain pupils may still require special education adapted to their continuing needs. For the purpose of this document 'remedial education' is used in its popular meaning. It implies those special educational measures used to meet the needs of children with learning difficulties in special classes within the ordinary schools; in special remedial centres which pupils attend on a part-time basis; or in groups withdrawn from their ordinary school classes for special teaching by a remedial teacher who may be a member of the staff or a visiting 'peripatetic' remedial teacher. It also includes the work of specialist advisory remedial teachers who may help and support other teachers or schools. In other words, remedial education is that part of special education concerned with children with learning difficulties which takes place outside the special schools.

The extent of the problem

The percentage of the school population requiring special educational treatment because they are backward or retarded, or have specific learning difficulties, has been variously estimated between 10 and 15 per cent of children in the ordinary schools. For the present discussion a median figure of 12½ per cent will be used. Of this $12\frac{1}{2}$ per cent of pupils, some are receiving education in special schools for educationally subnormal pupils, but nowhere in the country does such provision exceed 2 per cent of the school population. It follows, therefore, that remedial education as defined above applies to at least 10 per cent of the total school population. Yet this global figure of 10 per cent can be most misleading. The difficulties which beset pupils requiring remedial education are known to be closely related to social class and, consequently, the percentage of pupils requiring remedial action varies considerably from area to area in our towns and cities. Indeed, there may be considerable differences between adjacent schools

In summary: remedial education is required by over 718,000 pupils in our ordinary schools and the location of this unevenly distributed subpopulation requires a close study of local schools' populations.

The extent of provision

There are no reliable national figures relating to the provision of remedial education for there has never been any large-scale survey of this area of education. The annual Statistics of Education provide no information; such local surveys as exist use different definitions and are difficult to reconcile; and the only regional survey available excluded the large and important facility of the provision of remedial education in special classes.

Discussion with the people responsible for remedial education in many parts of the country indicates that nowhere is provision considered to be adequate. The general impression is that about one-third of county boroughs and one-half of county LEAs have made a start on provision and that the best of them are approaching one-half of the necessary provision. There is a confusing variety of organization in remedial education and even greater variation in the remuneration of remedial teachers. Control is equally haphazard. Some remedial teachers just do not know to whom they are responsible: in other areas they are responsible to general inspectors without special training or experience; in other areas educational psychologists strive to run the service though mostly overloaded with other duties; in a few areas the service is responsible to trained and experienced teacher advisers or inspectors. Special classes, in particular, are often found working in isolation from the specialist advice which is required if they are to work efficiently.

In direct human terms the above situation can have only one meaning. It means that the backward child who does not enter a special school is left in the most hazardous situation in the whole of the education system. His educational future is at the mercy of completely fortuitous local circumstances which may differ not only from area to area but also from school to school, or even from term to term within the same school. It is not putting it too bluntly to say that so long as this situation is allowed to continue, talk of equality of educational opportunity will have a hollow ring.

In relation to the kind of remedial education provided in most areas there must also be some reservations, particularly so far as peripatetic teaching is concerned. Most of this teaching seems to centre on reading skills and it is possible that there is too little concern about the important basic skills contributing to numeracy. Also, research findings suggest that the long-term results of the peripatetic teaching of reading are open to considerable doubt, possibly because such teaching is often isolated from the general education of the pupil. In many remedial centres the teaching is equally isolated from the general education of the pupils and may be open to the same doubts, though there has not, as yet, been any adequate evaluation of this form of remedial provision. In special classes the doubts take a different form. Here it is often pointed out that teachers are placed in charge of such classes who are without the training and/or experience required for their exacting work. And in all these facilities the quality of remedial education is gravely threatened by impermanence of provision. The root cause of this is movement of experienced staff and the most obvious reason is the lack of any clear career structure offering reasonable prospects of professional advancement to teachers in remedial education. From all parts of the country come reports of gifted and experienced remedial teachers moving into primary schools, special schools and colleges of education to secure better prospects of promotion. That they take benefit to those areas of education is not in doubt: but the movement does contribute directly to the risks faced by children who require remedial education.

The challenge facing remedial education If the educational needs of backward children in the ordinary schools are to receive adequate attention certain major objectives must be achieved. These may be stated, briefly, as follows. First there must be a rapid expansion of all facilities in all areas; at the same time the quality of all provision must be lifted at least to the level of the existing best; and, contributing to these objectives, permanence must be introduced through the creation of a career structure which will make it possible for first-rate teachers to satisfy their advancement needs within the area of remedial education. It is to this latter point that the rest of this discussion paper will be addressed through a consideration of the basic assumptions required in remedial education and the definition of levels of responsibility in operational terms.

Basic assumptions of a system of remedial education The first basic assumption concerns the relationship of remedial education to the special education of backward children and children with learning difficulties. Remedial education constitutes that part of the above special education which takes place outside special schools; it is also the larger part of such special education. Because of this relationship, the provision of remedial education should be seen as continuous with the provision of special (ESN) schools, for these two facilities complement each other and the provision of adequate remedial education would allow the special (ESN) schools to concentrate on providing for those backward children whose difficulties are exceptionally severe. This will become increasingly important as the education of the subnormal children in junior training centres becomes integrated into the educational system.

The second assumption is that remedial education is education. As such, not only must remedial teaching itself be integrated with the total education of the child, but the provision of remedial education must be seen to be clearly within the system of education rather than as a supportive service such as educational psychology or school health services. Educational psychologists will continue to contribute more directly to remedial education than to ordinary education, but this must not be allowed to obscure the fact that by far the larger part of the former is equally education and concerned with the teaching of children by specially trained teachers. This is consistent with the Summerfield Report (Psychologists in the Education Services, 1968), that psychologists should not be responsible for remedial education except where the primary purpose of classes is treatment by psychological methods (paras. 6.50; 6.22; Rec. 6.17).

The third assumption, which follows from those above, is that remedial education should be organized separately from the school psychological service. This service will naturally continue to contribute advice and support to remedial education, but, again with Summerfield, it would be the responsibility of teachers to decide when such psychological assistance was required (para. 6.22). Such an arrangement could be very efficient. The remedial service would provide the first contact with children failing in school, in most cases the problems would be resolved at this level, but the service could also identify those pupils whose needs required the more specialized (and more scarce) skills of the educational psychologist. An arrangement such as this would satisfy the point made in the Summerfield Report that psychologists should not be used on duties where their psychological training is not required and that they should not undertake duties more appropriate to educational inspectors or advisers (Summerfield, paras. 6.47, 48, 51; Rec. 3.R4; 6.R16).

The fourth assumption is that remedial education should be represented at the highest level in the educational advisory structure of LEAs. This would best be achieved by having at its head an officer directly responsible to the Chief Education Officer. Such an officer should be an educationist with specialist training and experience, capable of overlooking the total provision of special schools and remedial education. He would be an expert in the education of children with learning difficulties for these disabilities extend over all categories of handicapped children. In larger LEAs it may be necessary for there to be some delegation of duties to senior assistants but overall control and direction seems to be required if special schools and remedial education are to be developed as complementary parts of a comprehensive service. The head

of such a section of the education service would be responsible for between 15 and 20 per cent of the local school population; an adequate reason for stressing his quality as an educationist and his status as an officer of his Local Education Authority. In suggesting that this officer should be a specially trained educationist, no slight is intended to the psychologists, general advisers, medical officers or assistant education officers who may be sharing similar duties at the present time. The suggestion rests on two points: first, advanced training of teachers has now produced an adequate pool of teachers who are admirably prepared for such an appointment; second, the extent and nature of the task means that full-time effort is required if the job is to be fulfilled efficiently. Nevertheless, the officers mentioned above would be equally eligible with teachers for appointment to these posts if they possessed the relevant qualifications and were prepared to accept full-time appointment to the post. One final point favours the appointment of teachers. If there is to be an adequate career structure in remedial education, then there must exist a real possibility of teachers reaching the highest position in the service: without this there will be a constant leakage of the best men and women from remedial education.

The fifth assumption concerns the kind of remedial education provided, particularly within the peripatetic service. There is a need to shift these services towards an orientation in which they assume a more advisory role and accept responsibility for the quality of remedial education given in and by schools. This means that wherever possible remedial teachers should work as full-time members of the staffs of schools, or, where this is not possible, peripatetic work should be organized to allow teachers to cover fewer schools than is usual and spend longer periods of time working in individual schools. Such changes, together with increasing support from advisory remedial teachers, should allow the remedial teaching of children to be fully integrated into the general education of the children receiving it. This would help to offset some of the weaknesses highlighted by research as well as enhancing the preventive role of the advisory service which might well reduce the demand for remedial education.

The sixth assumption is that a way can be found to locate the unevenly distributed population of pupils who require remedial education. Perhaps the best method would be to insist that each school carry out a survey of its own school population. From such surveys it would be possible to locate and assess the remedial problem in each school and decide upon the number of remedial teachers required to meet it. By compositing the figures for individual schools, the establishment of peripatetic and advisory teachers could also be worked out and taken account of in deciding the remedial establishment for individual schools. These surveys would need to be repeated regularly in order to reassess the extent and location of the remedial problem and to keep resources related to the task: they would also form the basis of the national figures which were shown to be unobtainable in section three above. Flexibility in meeting changing needs and increased permanence in remedial provision would be enhanced if the establishments arrived at by the above methods were considered as outside the 'points system' which is the basis of payments for posts of responsibility in schools. There is a very logical case for this action. The 'points system' is directly related to the number of pupils in the school; but there is no direct relationship between the size of the school and the extent of the remedial problem which it presents - this is more likely to relate to the social class composition of the school population. A move such as this would give immense scope to schools and LEAs in their attempts to meet their problems. Further, if the establishments were regarded as appointed within the LEA, with the understanding that teachers were willing to move to meet changes in the location of remedial problems, then permanence of provision might at last be within reach.

The seventh assumption is that it is possible to introduce a universal payment for teachers working in remedial education and in special schools which would simplify the task of creating the career structure needed in remedial education. This could be done by abolishing the 'special schools allowance' at present paid to teachers working in such schools and replacing it by a 'special education allowance' (SEA). This SEA would be paid, as of right, to all teachers in special schools,

in special classes within the ordinary schools, in remedial centres, in the peripatetic service or in the advisory service, or to those remedial teachers employed permanently on the staff of one school. The SEA would be a basic payment for the additional difficulties faced by the teachers in their exacting work and would not include any element of responsibility pay for advising other teachers or supervising their work. Payment for such responsibilities would be additional to SEA and would mark out the career structure in remedial education. In schools these payments would be outside the 'points allowance' of the school as suggested in assumption six above.

These, then, are the basic assumptions needed if there is to be a serious attempt to meet the needs of pupils who require remedial education. They also contribute to the conditions required if there is to be a clear career structure which will encourage good teachers to remain in remedial education. The next section will attempt to define the levels of responsibility which could make up that career structure in operational terms which can be applied to schools, centres or the

remedial services.

Levels of responsibility in remedial education

It must not be assumed that remedial education in every area will require workers at every level of responsibility defined in this section. Much will depend on local conditions and in certain circumstances duties defined here at different levels may need to be combined.

Level one. This is the basic level of remedial teaching. The responsibility of teachers working at this level is for the quality of their own professional work with the children they teach. These teachers constitute the main teaching force in schools, in special classes, in remedial centres and in the peripatetic teaching service. It is not intended that they should have responsibility for the guidance of other teachers and their own work may be supervised by more experienced colleagues who may also be responsible for the selection of their pupils. Ideally they should be participating in some form of in-service training to extend and improve their skills and willingness to participate should be regarded as an essential qualification

for appointment. These teachers would be paid the basic SEA above their salaries as teachers.

Level two. Teachers at this level will be engaged in remedial teaching themselves but will have the additional responsibility of supervising and guiding the work of a number of colleagues at level one. Their responsibility here will be mainly for help with classroom routine and teaching skills: it will not normally be concerned with questions of curriculum content or with the selection of pupils. These teachers would be senior members of remedial departments or remedial centres which were in the charge of more senior teachers. They may be full-time peripatetic teachers given some responsibility for a number of part-time teachers; or a full-time peripatetic teacher may be given nominal responsibility for a small number of colleagues working in close proximity to each other. These teachers would be paid the basic SEA plus an appropriate responsibility allowance. For appointment at this level teachers would be normally expected to have completed a full-time or part-time course at supplementary certificate level or to have completed very substantial in-service training.

Level three. At this level the weight of the teacher's work moves into the advisory area. There would be advice to teachers at levels one and two and they would also be involved in selecting pupils to be taught at those levels. In addition they would have responsibility for advice to headmasters about matters of curriculum content and materials and school organization for work with backward pupils. They would also supervise surveys carried out by the staffs of schools or by their own junior colleagues. They would be responsible for individual testing in their areas and would supervise group testing by their colleagues. When necessary they would lead case studies on individual pupils and their needs and would contribute to the in-service training of other teachers. In primary and secondary schools these teachers would be heads of remedial departments; in remedial centres they would be the teachers in charge of the centres; and in the advisory services they would be area remedial advisory teachers. For appointment at this level teachers would have substantial successful experience in remedial education as well as successful completion of an advanced course appropriate to work in remedial education. These teachers would be paid SEA plus a responsibility allowance higher than at level two.

Level four. Teachers working at this level might continue with the advisory role of level three but they would accept further responsibility for the efficiency and development of remedial education over a wide area as well as for the efficiency of dayto-day administration in their area. In large LEAs it might be necessary to appoint at this level in order to reduce administration to levels manageable at the operational level. In other cases a head of special education might designate a colleague at this level to be responsible for remedial education as a sensible division of forces in a large authority. On the other hand, some smaller LEAs may find that work at this level could be efficiently integrated with an appointment at level five. An exceptionally large remedial centre might qualify its head at this level, especially if he should have responsibility for extensive buildings and equipment. A department in a large secondary school where remedial education was combined with wider Newsom work and all the responsibility of one head of department might qualify the head for appointment at this level though it would be appropriate in such circumstances to have a deputy in the department with specific responsibility for the remedial work, possibly at level two or three. Training at this level would be that appropriate to level three but administrative ability would also be essential. Payment would be SEA plus a responsibility allowance higher than at level three.

Level five. This would be the level for the appointment of the advisory officer in charge of special schools and remedial education. Whether his title was inspector or adviser would depend on the usage of the LEA: the important thing would be that his status should reflect the extent and importance of his responsibility. He should work directly with the chief education officer of the LEA and with the committee responsible for special education. He would be the chief educational adviser to that committee, responsible to it for the quality of the initiation of curriculum and educational development over

the whole area. It would help coordination if he were also chairman of a standing officers committee consisting of the medical officer for special schools, the assistant education officer for special services, the senior educational psychologist and the senior school welfare officer. In addition to the highest qualifications appropriate to the appointment, teachers aspiring to this level should have a wide experience in special education and particularly in the education of backward children; they also need administrative ability, educational insights of a high order and the capacity for personal leadership. Salary would be at the level next below that of the chief inspector for the LEA.

The exact numbers of teachers to be appointed at the above levels cannot be discussed in a general paper as local circum-

stances would be the deciding factor.

Summary

Remedial education, defined for the purpose of this paper, was seen as that part of the education of backward children, or those with learning difficulties, which took place outside special schools. The extent of the problem and provision for meeting it could only be subjectively assessed because of the absence of adequate surveys in this area of education. Seven basic assumptions were postulated as the basis of a rational system of remedial education and five levels of responsibility were defined as a possible structure for career advancement in remedial education. Remedial education is postulated as an educational service separate from the schools psychological service with which it has close links: this, it is claimed, is consistent with the Summerfield Report. It is suggested that backward pupils in the ordinary schools are in the most hazardous position in the education services for their education depends on fortuitous local circumstances. Adequate provision of remedial education is urgently needed for their educational wellbeing: it would also free the special schools to develop the special education needed for severely mentally handicapped children and this will become increasingly more important when the junior training centres are integrated into the educational system.

Remedial education: programmes and progress

Reference

SUMMERFIELD REPORT (1968) Psychologists in the Education Services, HMSO.

10 Broadening the role of remedial teachers Edwin Mason

Our work over the last three years in the Curriculum Laboratory of Goldsmiths' College has led us to think that the role of the expert remedial teacher in the secondary school can be, and should be, much more diversified than it currently is. I should perhaps first explain what our work is, to give a frame of reference in which my following comments may be set.

The Curriculum Laboratory is designed to act as a communications centre for new ideas in education, keeping up a review of such ideas in collaboration with colleagues both in schools and colleges and institutes of education, extending this collaboration where we can to such 'outsiders' as employers, sociologists, psychiatrists, social workers and architects who share our concerns. Our chief structure of this collaboration is the running of unstructured in-service courses for experienced teachers which operate as extended conferences, a shared exploration of possibilities. We keep in touch with teachers who attend (or visit) courses, supporting them so far as we can with any innovations they undertake when they return to their schools. We keep contact too with any school which approaches us for advice (and many do); and where it is possible, establish an alliance which allows for experimental teaching to be undertaken in the schools by pre-service students from Goldsmiths' or other colleges sympathetic to our viewpoint, working in small groups. Our role is entirely consultative, and we are called on internationally by people working at all levels in a variety of educational systems. As much as other commitments allow, we go out to teachercourses elsewhere and to conferences, to ensure that we remain genuinely in touch with teachers rather than to proselytize. To establish communication with people we cannot meet (there are only five of us on staff) we publish reports and bulletins. So far, this has meant six reports based on working papers evolved by courses, and regular issues of our bulletin Ideas, which aims to publicize interesting practical innovations in schools, and to review current experiments which have a bearing on our changing view of learning processes. We intend soon to publish supplements to Ideas, going deeper into specific educational issues, and at a less grand level, brief 'advice sheets' (or 'Why not try this?' leaflets) each dealing with a single problem of teaching, to pass on rapidly hints we get from schools, or to answer questions which we find teachers frequently asking us.

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Streaming irrelevant

We have, then, been deeply involved in all these ways for three years with many teachers and others: and of course we all came to this work after years of experience of teaching and of pioneering changes in education ourselves, before we settled down to work together as a team. Out of the experience and the dialogue has emerged a quite new picture of the desirable shape and style of schooling needed by all children. Since we can find little to be said for class-teaching, but a great deal to say for having children work in small heterogeneous groups (or clusters) of about five or fewer, questions of 'streaming' have become from our point of view simply irrelevant. I know that the process of 'unstreaming' which most progressive schools are undertaking faces the remedial teacher with some hard problems of organizing help for markedly weak students. Streamed schools, which produce actual 'remedial streams' make even worse problems for the children. To have been deemed and labelled backward as a person in toto cuts all grounds for learning away under your feet. We have conducted a more radical examination of the organization of schooling, isolating as the most damagingly restrictive the practice of determining the structure of schooling by operating two systems of distribution - distribution of time in small parcels to subjects, and distribution of teachers to classes of children. We propose a different basic structure, an interdisciplinary 'focus-group': up to five teachers tending a yeargroup of about 150 children who cluster and re-cluster as the flow of work demands. If other groupings are used additionally in the school, it is for specific purposes to fulfil demands in a fourfold curriculum; but they should be secondary and temporary, not basic, groupings.

We see all children as needing four kinds of activities flexibly integrated in a meaningful way. These are not four equal 'areas' of curriculum, but rather four symbiotic systems, each of which may at any given time be dominant. They are:

- (a) experience of interdisciplinary enquiry (organized in collaboration with the focus group of teachers) where subject boundaries need not be observed;
- (b) experience of autonomous studies, where subject boundaries will be observed (but may well be chosen from a greater array of subjects than is now common);
- (c) remedial support wherever a child and his teachers recognize he's up against a barrier which is retarding his general progress or blocking him on a specific path of study he's chosen to pursue;
- (d) the pursuit of strong personal interests (ephemeral or persistent) which are not being expressed elsewhere in the curriculum and for which time needs to be allowed.

Having developed this picture of a new curriculum design, what news have we especially for remedial teachers? The first salient fact is that we certainly do not see such teachers as being limited in contact to a clearly defined minority of youngsters - those whose resistance to learning (generated by a great variety of causes whose scope we reviewed in our Third Pilot Course Report, On the Education of the Socially Handicapped) insists on being noticed. All youngsters need an expert analysis of their difficulties from time to time, and it is here that the remedial teacher finds a new role in the organization of the whole school, in helping to detect immediate causes, and advising on the development of programmes to meet the need. There are new techniques of programming (reported in our bulletin Ideas, number 7) which we are sure will prove very helpful here. We hope that they will also give us help in improving modes of diagnosis. But we rely most of all on the complex skill which the remedial teacher has above all - the penetration of the disguises children adopt to protect their sorer weaknesses, the exact location of the fundamental difficulty which can only be achieved by a reassuring attempt by the teacher really to know the child.

Clustering

We hope, of course, that the commonest causes of the simple mechanical failures will be largely overcome by the shift of emphasis and organization from the large 'submersive' groupings in the school to 'clustering'. The great common cause is poverty of communication, an under-exploitation of language at home operating to constrain the young from profitable manipulations of the environment and hardening into narrowness and insensitivity of perception unless the school can trigger richer verbal activity, not as a ritual but as part of an exploration of personal realities. In the cluster, unlike the class, all are involved in discussion of the matter in hand: there is never a need to wait for your waving hand to be recognized, no parliamentary procedure to negotiate, no question of your right to speak and to contribute to the life and work of the group. Both strengths and weaknesses can readily and safely be revealed: in this way the basic prerequisite for linguistic (and social) development is met. We do not need to cripple children first by subjecting them to arbitrary restraints, and then provide special care for some of the victims of our treatment.

Some, of course, we know, will need more adult help than others, to enter fully into collaborative learning through enquiring in clusters (especially those who find it difficult to 'join in' anything because their faith in themselves has been damaged elsewhere than in school). The remedial expert in a focus-group of teachers has both a direct role to play with the children here and an indirect one of helping colleagues with advice. The centre of the remedial teacher's expertise has always been his capacity to persuade youngsters that they can in fact function in ways other teachers have 'proved' to them they cannot master. Working in 'hot' communicative situations, we do not have to face the clumsy learner with the initial battery of dissuasion that then has to be overcome by special provisions - especially where the situation allows for the use of a multiplicity of media (modelling, graphics, movement, still and cine-photography, maths as a language and so on) as tools given equal validity to the written word. Written words have their value (I say piously to my typewriter) but let us demythologize them, and live in the now world, not the world of a Victorian penpusher. The file of minutes must be seen, in the age of computer-storage of information (recorded in a number language which will translate itself back into however many verbal languages you care to clue the machine for, and what is more, give you a verbal précis of information grouped as relevant to any question you may ask it) as having had its day. The computer can even, if you tell it beforehand, note the ambiguities of 'the file of minutes'.

Extensions of the remedial teacher's role

I have indicated so far three specific extensions of the remedial teacher's role:

organization of remedial programmes;

 detection of the points where remedial help is needed (given a normal situation in the school which does not reinforce weaknesses while hiding them, the way most class-teaching does);

3. advising colleagues on their handling of small heterogene-

ous groups.

There is another critical and sensitive role, to be shared with colleagues, in which I believe a skilled remedial teacher can offer very valuable leadership. This is the detection of strengths, of the individual bent and style of each child, the location of his most urgent concerns, on which alone his learning can, at any time, be founded. I have seen so many bright children dwindle into dullness and an acceptance of boredom, entering into a lack-lustre life simply because teachers lost sight of what mattered to them and lost faith in them when they were facing the worst (but survivable) perplexities of puberty, that this is the point I most want to stress. If we can locate the concerns of the young, and keep to the rhythm those concerns dictate, we can by gearing ourselves to a fourfold curriculum help them to centre their learning on their concerns in three ways;

(a) through the choice of work collaboratively undertaken in

interdisciplinary enquiry;

- (b) through a choice of courses of autonomous study (making up our minds to let him, say, use a correspondence course to learn Japanese if that and not French is what he wants to learn); and
- (c) through promoting, rather than merely permitting, the development of personal interests beyond anything that we have offered, and taking this seriously enough to allow 'school time' for it.

To do all this, we must be able to see the strengths of individual children as they develop. I have known many good remedial teachers. They have never nagged away at weaknesses. They have instead developed a personal relationship which allowed respect on both sides, finding worth in children whom others disrespected, seeking the strengths in a youngster which could be used to overcome the weaknesses. This is the approach that all teachers should now be adopting. The leadership needed in breaking down the sterilized impersonality, the mask-wearing, that teachers get from years of subject-centred class teaching, has to be subtly offered to colleagues in the same way as the remedial teacher offers it to his pupils. It is a matter of example rather than of formal advice.

I am aware of having condensed this article to the verge of impenetrability. My colleague Charity James argues the case much more fully in a book Young Lives at Stake (Collins, 1968); and apart from our publications I have already mentioned, I have drawn quite heavily on our other Pilot Reports, especially number 2, The Raising of the School-Leaving Age and number 5, The Changing Role of the Learner. All are available from L. A. Smith at the University of London Goldsmiths' College Curriculum Laboratory, 6 Dixon Road,

London SE14.

Evaluation of remedial education

Carroll's article (11, p.90) admirably summarizes the results of recent research into the effects of remedial teaching of reading. It is not his fault that the findings are generally negative, and he does his best to offer some constructive suggestions. Widlake (12, p.103) found that a 'reading drive' produced unmistakable evidence of the importance of the teacher: 'no other single factor has the weight and significance of teacher performance'. Here, then, is an explanation for the generally negative findings - good teaching is cancelled out by bad; a pedagogic Gresham's law. At least it can be shown that when a good teacher gets down to the job, attainment can be lifted significantly. The kind of research which continually establishes low correlations between teachers' efforts and longterm outcomes really has very little to commend it, though this is not to suggest that we should be chary of evaluating the effectiveness of our teaching; after all, two teachers failed to produce any gains (Widlake, 12 p.103) and certainly required some feedback! Rather, it is suggested that research could most usefully concentrate on isolating possible sources of failure and on identifying successful learning programmes.

11 The remedial teaching of reading: an evaluation

H. C. M. Carroll

In a short article of this kind, it would be impossible to view adequately all the research on this subject and offer a reasonably up-to-date evaluation. In any case, for the period 1949-66, two most useful reviews already exist, namely those of Sampson (1966), who examined what had been written about reading and adjustment, and Chazan (1967), who, in a short but comprehensive article, reviewed research which had been concerned with both the short- and long-term effects of remedial teaching in reading and how such treatment affects social and emotional adjustment.

Instead of reviewing all the literature, certain key articles will be examined and, in the light of their findings and other evidence which will be presented, an attempt will be made to establish what, on scientific and pragmatic grounds, could be considered today an acceptable point of view on the subject of the remedial teaching of reading.

One of the first published attempts to evaluate the effectiveness of the remedial teaching of reading was made by Burt and Lewis in 1946. Since then many other studies have been carried out. These have been concerned, amongst other things, with:

- 1. the short-term effects of such treatment: Burt and Lewis (1946); Schonell and Wall (1949); Birch (1949, 1950); Valentine (1951); Curr and Gourlay (1953, 1960); Dunham (1960); Hillman and Snowdon (1960); Kellmer Pringle and Sutcliffe (1960); Collins (1961); Lovell et al. (1962, et al. (1971);
- its long-term effects: Curr and Gourlay (1960); Collins (1961); Lovell et al. (1962, 1963); Lytton (1967) and Shearer (1967);

- 3. its influence on one or more of the following, namely. attitude to school in general and reading in particular, and social and emotional adjustment: Schonell and Wall (1949); Valentine (1951); Dunham (1960); Hillman and Snowdon (1960); Kellmer Pringle and Sutcliffe (1960) and Collins (1961):
- 4. the relationship between the length of treatment and improvement in the level of reading: Cashdan and Pumfrey (1969);
- 5. the effectiveness of counselling as a remedial technique: Lawrence (1971).

Poor experimental design

The general conclusion which could be drawn from the results of many of these studies would be that remedial teaching was effective for most children in so far as it improved social adjustment and attitude to reading and produced gains in reading ability which were significantly more than what would have been achieved had the children not been treated. However, the majority of the very early studies and also some of the later ones suffered from poor experimental design and inappropriate statistical techniques, with the result that doubt is thrown on such a conclusion.

It was a critical article and study of remedial reading by Curr and Gourlay (1953) which first drew attention to the weaknesses of earlier studies and which consequently led to a series of exchanges between Curr and Gourlay (1953, 1960), Birch (1953) and Kellmer Pringle and Gulliford (1953). Curr and Gourlay considered that the data of studies previous to theirs had been subject to one or more of three possible misinterpretations, namely:

- 1. that part of the gains reported were due, not to remedial teaching, but to practice effects arising from using the same test at the beginning and end of treatment;
- 2. that improvements in reading were also the result of familiarity gained during the period of remediation with the kind of materials found in the texts used to reveal the effectiveness of treatment;
- 3. that previous authors had failed to take into account the

effect of statistical regression, an excellent educationally slanted account of which is to be found in an even earlier paper by Philpot (1945).

Collins and post-Collins

If the articles by Burt and Lewis (1946) and Curr and Gourlay (1953) may be considered key articles one and two, the third key piece, from a chronological point of view, would be a book by J. E. Collins (1961). Its significance lies in the fact that it contains a report of a well-designed study which, amongst other things, was not subject to any of the misinterpretations listed by Curr and Gourlay (1953). Collins concluded from his research findings that treatment only accelerated reading development, had negligible long-term effects and had no measurable influence on social maturity and personality development. Furthermore, in terms of effectiveness, he inferred that it did not seem to matter whether treatment was given at a remedial centre or at school, a finding which was confirmed by Lovell et al. in 1962 using much larger groups.

For the most part, studies which have followed that of Collins have confirmed his findings (Lovell et al., 1962, 1963; Cashdan and Pumfrey, 1969; Cashdan et al., 1971), although not completely so in every case. Thus Lytton (1967), following up one to two years after remedial treatment, two groups of children, one of which was teacher-selected and the other test-selected, reported that some children had maintained their gains, particularly (a) those of higher intelligence, and (b) those who remained in the primary school after treatment. With respect to the method of selection, he found that, as judged at the end of treatment (Lytton, 1961) and at follow-up, there was 'no significant difference in effectiveness between selection by tests and selection by teachers' judgment' (Lytton, 1967, p. 1).

Another study which produced findings not quite in accordance with those of Collins was that of Shearer (1967). He found that the reading attainment of those who had been given remedial treatment three and a half years before was significantly higher than that of pupils who had not been treated, particularly in the case of pupils who continued to receive

remedial help in their secondary schools. Like Collins, Lovell and others, however, Shearer noted a significant slowing down of progress after remedial treatment had ceased.

The fourth key reference is that of Cashdan et al. (1971). Its significance lies in the fact that, unlike previous studies into the effectiveness of reading, its findings were based on results from a very large sample of over 1,200 retarded readers. The group had the following characteristics, expressed as mean values: the chronological and reading ages at the beginning of remedial treatment were, respectively, just under nine and six years. Teaching, for the most part, was given by an 'outside' teacher for short sessions once or twice per week and lasted about eleven months. At the end of this period, a twenty-one month gain in reading age was noted. It was also found that, irrespective of their measured intelligence and despite the help given, some children had considerable difficulty in learning to read. This very large study thus bears out the findings of previous studies with respect to the dramatic short-term effects of remedial treatment and the presence of individual variation in response to treatment.

Questions arising

A number of important and very relevant questions arise from the research findings of the past twenty-five years into the effectiveness of remedial reading procedures, three of which are as follows:

- 1. Why, after treatment, does progress slow down, to the extent that, as reported in some studies, remedial help appears to have negligible long-term effects?
- 2. Why is it that conclusive evidence cannot be found to support, or disprove, the hypothesis that remedial treatment has positive and beneficial effects on attitudes to reading and on social and emotional adjustment?
- 3. Why do some children respond to remedial treatment and not others?

In order to answer these questions, it is necessary to know, amongst other things, what is involved in the reading process, what characterizes those with reading problems and what is the validity of the concepts 'retardation' and 'backwardness'. Consequently, an attempt will be made to provide very limited information on these three subjects.

1

The reading process

Descriptions of this are, not surprisingly, very numerous. The accounts of Foss (1967), Harborth (1968), Ravenette (1968) and Vernon (1971) are but a few of the many to be found in the literature. For the purpose of this article, it is sufficient to present one of these accounts, namely that of B. M. Foss. He considers, on the basis of evidence from many sources, 'that the skill of reading is dependent on many lower-order habits, for instance' (p. 119): recognizing letters and sequences of letters, distinguishing them from their mirror images; progressing from left to right across the page, and passing from line to line downwards; coding; auditory discrimination; discrimination and remembering of sequence of sounds and of speaking movements; and discrimination of rhythm and pitch. To this list may be added the conclusion of Geschwind (1964) that, in learning to read, visual perceptual abilities are likely to be less important by nine years of age than auditory perceptual ability and the ability to transpose between auditory and visual channels. Foss goes on to say that reading also involves certain special abilities, in particular, the kind involved in language. With respect to backwardness in reading, he believes that it 'may result from failure in any one of these lower-order habits and abilities, as well as from emotional blocks and inhibitions which may not have any close relation with the skill itself' (p. 120).

The characteristics of pupils with reading problems Under this heading it is necessary to consider two sets of characteristics, namely, individual and environmental. This is, of course, an artificial division for, in reality, the two sets of factors interact and are inseparable.

Vernon (1968) lists as the individual factors which can, under certain conditions, lead to backwardness in reading: poor intelligence and physique, frequent illnesses, uncorrected visual and auditory defects, speech disorders and emotional

maladjustment. In addition to some of these factors, Clark (1970) noted from her large-scale study in Dunbartonshire that poor auditory discrimination and poor visuomotor coordination were also significantly related to difficulty in learning to read.

Another fairly commonly held view is that many of those with reading problems are subject to maturational lag at a neurological level (Collins, 1961; Lovell et al., 1962; De Hirsch et al., 1966; Shearer, 1968; Harborth, 1968; Critchley, 1970). The introduction of the term 'maturation', however, is perhaps an unfortunate one, for it could imply development in the physiological sense described by Tanner (1961) when in actual fact reading would appear to be a cognitive process dependent on perceptual learning mechanisms. This is not to say, however, that in some cases of reading failure there may not be some kind of relationship between reading difficulty and neurological impairment. Lovell and Gorton (1968), for example, in a well-designed study, have provided evidence which suggests that reading failure in some children of average intelligence may really be related to such impairment. Certainly this is the view of those who believe in the concept of dyslexia (for example, Critchley, 1970; Miles, 1971; and Naidoo, 1971).

Turning now to the environmental characteristics which may be causally related to reading failure, it will again be useful to list the aspects described by Vernon (1968) and for which evidence exists. Significant factors would appear to be low socio-economic class, lack of parental interest in their children's school work, insufficient verbal interaction between mother and her pre-school child, and adverse factors in the

This last set of factors is particularly relevant in view of school. what happens to reading levels after remedial treatment has ceased. Morris, in fact, concluded from her study that 'a good deal of reading backwardness can be attributed to school conditions' (1966, p. 182). Morris found that children in junior schools who were backward in reading tended to have the poorest teachers, material classroom conditions and reading environment. Furthermore, Morris noted that 'the 95 majority of teachers did not accurately ascertain the particular difficulties of their retarded pupils', with the result that 'much of the instruction was not directed towards specific objectives' (p. 176).

From what has been written about the individual and environmental characteristics of pupils with reading problems, it will be apparent that there is probably much truth in the conclusion of M. D. Vernon (1960), that the causation of reading backwardness is multifactorial, different factors operating in different cases. The position is well put by Ingram (1971). Although he was writing about 'specific dyslexia' his conclusions are equally apposite for all forms of reading disability:

It is clear that 'specific dyslexia' or 'specific developmental dyslexia' is not a disease entity but is a syndrome which results from a number of different factors which are usually found in combinations. Some of them are intrinsic, others depend upon the social and educational environment of the patient.

Before remedial measures are employed it is very important that the precise causes of the difficulties in learning to read and write suffered by individual patients should be explored in depth. Only if such exploration is carried out can appropriate remedial measures be taken (Ingram, 1971, p. 12).

The validity of the concepts of 'retardation' and 'backward-ness'

During the 1950s and 1960s the concept of retardation (attainment age below mental age) came under severe criticism from some of the more statistically minded educationists and psychologists (Pidgeon and Yates, 1957; P. E. Vernon, 1958; Phillips, 1958; Curr and Hallworth, 1965); whilst that of backwardness (attainment age below chronological age) remained reasonably acceptable. Curr and Hallworth (1965), for example, carried out a large-scale empirical study of the two concepts and found, on subjecting their results to factor analysis, that backwardness was related to a number of socio-economic and

personal factors, whereas retardation was discovered to bear no relationship to any of the psychological and sociological measures associated with educational success or backwardness. They concluded that the concept of retardation does not appear to be anything more than a statistical artifact.

Further support for this kind of view is to be found in the fourth key reference of this article, namely, that of Cashdan et al. (1971). It is the opinion of these authors that it is not necessarily so 'that children who underfunction in relation to their mental age are somehow more promising or more deserving than those who are simply behind in relation to their chronological age' (p. 104). Acceptance of such a view by those whose job it is to select children for remedial treatment could, of course, lead to a much larger number of backward children of lower intelligence receiving more specialized help.

The three questions

It is now appropriate to return to the three questions posed earlier in this article. The first was concerned with the slowing down of progress after treatment and the fact that, in certain studies, negligible long-term effects had been found. If Morris's conclusion, that much of reading backwardness can be attributed to school conditions, can be generalized from the Kent study to schools in general, then it seems reasonable to conclude that much of this slowing down could also be attributed to school conditions, a view which is, in fact, supported to some extent by the empirical evidence of Lytton (1967) and Shearer (1967). If one adds to this the continuing presence of some or all of the individual and environmental factors which originally led to reading backwardness, factors which are likely to be much more potent once treatment has ceased, then it is only to be expected that progress would slow

As for the findings of some studies, that long-term effects down. proved negligible, it seems likely that the effect of treatment was simply temporarily to accelerate learning to read so that a certain level of ability was reached earlier than would otherwise have been attained had treatment not been provided. Whether or not these findings can be explained on a maturational basis, or in terms of what is to be expected when a complex skill such as reading is learned, or both, is still a matter for conjecture. The point is well made by Cashdan and Pumfrey (1969) who, in trying to account for the fact that, twenty-two months after remedial treatment, there was no difference between the treated group and the untreated control group, suggested that the 'natural' improvement of the control group may not have been due to maturational factors' but to the effects of extra, indirect help. For example, children with reading problems who remain in the school 'get indirect help in the form of advice given to their teachers from the Remedial Service, relief of pressure if some of their classmates are being helped, and so on' (p. 142).

Turning now to the second question - this related to the disappointing findings in connection with the effects of remedial treatment on social and emotional adjustment and attitude to mork - a simple, probably over-simple, answer will now be offered. It seems likely that at least two reasons may account for the findings referred to. Firstly, the instruments used to detect changes were insufficiently sensitive, and secondly it is possible that failure in reading was but one of several factors leading to a negative attitude and/or social and emotional maladjustment. Treating the reading problem may have done little to relieve the other tensions and difficulties so that, at the end of treatment, little or no change in attitude or adjustment could be detected. In this context, a small study by Lawrence (1971) is particularly interesting for he found that, over a period of six months, Rogerian type counselling with or without remedial treatment for twenty minutes per week produced significantly better reading improvement in eightto nine-year-old readers than remedial treatment alone. Furthermore, counselling also appeared to produce positive personality changes. If the result of this study can be replicated using larger samples and better matched groups, it would seem that, by using counselling techniques, it would be possible not only to improve social and emotional adjustment, but also to produce significant gains in reading ability. Whether or not such changes would be long lasting, however, remains to be

Now to the third, final and perhaps most important question. This was concerned with the fact that not all pupils are responsize to remedial treatment. From what has been written about the complexities of the process of learning to read and of the multiplicity of possible interacting factors, both individual and environmental, which can cause backwardness, one should not, in fact, be surprised that some children fail to gain much from remedial treatment. Furthermore, it may well have been that some of the poorly responding children in the studies referred to were really suffering from the kind of dyslexia described by Critchley (1970) and others. Even more probable, however, is the possibility that the cause of these children's reading problems had not been accurately diagnosed, with the result that, for them at least, the remedial techniques employed were inappropriate, and consequently did not produce significant gains in reading level. Finally, in view of what has been written about the concept of retardation, it may well have been that, by limiting, in many cases, the selection of children for treatment to the retarded group only, a number of children who would have benefited from remedial teaching did not receive it, whilst a number of those who were given treatment were taught in a manner inappropriate for their kinds of reading problems.

Conclusions

There would seem to be certain implications which may be drawn from what has been written. Firstly, the time may well have come for some remedial services to rethink their selection and treatment policies. What is needed is both more refined diagnostic techniques and more specific reading programmes tailored to meet the individual needs of children with severe reading difficulties. Secondly, remedial treatment should not end as soon as the pupil leaves the remedial class or group. So that help of the right kind may be continued, remedial guidance should be given to the child's teacher by the remedial specialist. Thirdly, and perhaps most important of all, it is vital that remedial teachers should not lose heart because of the disappointing research findings. Perhaps, when more is known about the process of reading and why some children have difficulties in this most important of basic skills, remedial teachers will be in a better position to deal with such problems in a manner which will give both them and the children they teach the kind of satisfaction which comes from real and lasting success.

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References

- BIRCH, L. B. (1949) 'The remedial treatment of reading disabilities', Educ. Rev., 1, 107-18.
- BIRCH, L. B. (1950) 'The improvement of reading ability', Brit. J. Educ. Psychol., 20, 73-6.
- BIRCH, L. B. (1953) Comments on the article 'An experimental evaluation of remedial education', Brit. J. Educ. Psychol., 23, 56-7.
- BURT, C. and LEWIS, R. R. (1946) 'Teaching backward readers', Brit. J. Educ. Psychol., 16, 116-32.
- CASHDAN, A. and PUMFREY, D. (1969) 'Some effects of the remedial teaching of reading', Educ. Res., 11, 2, 138, 142.
- CASHDAN, A., PUMFREY, P. D. and LUNZER, E. A. (1971) 'Children receiving remedial treatment in reading', Educ. Res., 13, 2, 98-105.
- CHAZAN, M. (1967) 'The effects of remedial teaching in reading: a review of research', Rem. Educ., 2.1, 4-12.
- CLARK, M. M. (1970) Reading Difficulties in School, Penguin, 'Papers in Education'.
- COLLINS, J. E. (1961) The Effects of Remedial Education, Oliver & Boyd. CRITCHLEY, M. (1970) The Dyslexic Child, W. Heinemann Medical Books.
- CURR, W. and GOURLAY, N. (1953) 'An experimental evaluation of remedial education', Brit. J. Educ. Psychol., 23, 45-55.
- CURR, W. and GOURLAY, N. (1960) 'The effect of practice on performance in scholastic tests', Brit. J. Educ. Psychol., 30, 155-67.
- CURR, W. and HALLWORTH, H. J. (1965-66) 'An empirical study of the concept of retardation', Educ. Rev., 18, 5-15.
- DE HIRSCH, K., JANSKY, J. J. and LANGFORD, W. S. (1966) Predicting Reading Failure, Harper & Row.
- Department of Education and Science: Central Advisory Council for Education (Wales) (1967) Primary Education in Wales (The Gittins Report), HMSO.
- DUNHAM, J. (1960) 'The effect of remedial education on young children's reading ability and attitude to reading', Brit. J. Educ. Psychol., 30, 173-5. FOSS, B. M. (1967) A Psychological Analysis of some reading processes.

Second International Reading Symposium, ed. by J. Downing and A. L. Brown, Cassell, pp.118-23.

GESCHWIND, N. (1964) The Development of the Brain and the Evolution of Language, Monogr. Series on Language and Linguistics, no. 17.

HARBORTH, M. (1968) Psycho-linguistics and Reading Failure, Third International Reading Symposium, ed. by J. Downing and A. L. Brown, Cassell, pp.146-63.

HILLMANN, H. M. and SNOWDON, R. L. (1960) 'Part-time classes for young backward readers', Brit. J. Educ. Psychol., 30, 168-72.

INGRAM, T. T. S. (1971) 'Specific learning difficulties in childhood: a medical point of view', Brit. J. Educ. Psychol., 41, 1, 6-13.

PRINGLE, M. L. K. and GULLIFORD, R. (1953) A note on 'An evaluation of remedial education', Brst. J. Educ. Psychol., 23, 196-9.

PRINGLE, M. L. K. and SUTCLIFFE, B. (1960) Remedial Education an experiment, Caldecott Community and University of Birmingham Institute of Education.

LAWRENCE, D. (1971) 'The effects of counselling on retarded readers', Educ. Res., 13, 2, 119-24.

LOVELL, K. and GORTON, A. (1968) 'A study of some differences between backward and normal readers of average intelligence', Brit. J. Educ. Psychol., 38, 240-48.

LOVELL, K., JOHNSON, E. and PLATTS, D. (1962) 'A summary of a study of the remedial reading ages of children who had been given remedial teaching', Brit. J. Educ. Psychol., 32, 66-71.

LOVELL, K., BYONE, C. and RICHARDSON, B. (1963) 'A further study of the educational progress of children who received remedial education', Brit. J. Educ. Psychol., 33, 3-9.

LYTTON, H. (1961) 'An experiment in selection for remedial education', Brit. J. Educ. Psychol., 31, 79-94.

LYTTON, H. (1967) 'Follow-up of an experiment in selection for remedial education', Brit. J. Educ. Psychol., 37, 1-9.

MILES, T. R. (1971) 'More on dyslexia', Brit. J. Educ. Psychol., 41, 1, 1-5.

MORRIS, J. M. (1966) How far can reading backwardness be attributed to school conditions? First International Reading Symposium, ed. J. Down-

NAIDOO, S. (1971) 'Specific developmental dyslexia', Brit. J. Educ.

PHILLIPS, C. J. (1958) 'Retardation and the use of tests', Educ. Rev., 11,

PHILPOT, S. J. F. (1945) 'Fallacious arguments from experiments on methods of teaching', Brit. J. Educ. Psychol., 15, 57-69.

PIDGEON, D. A. and YATES, A. (1957) 'Abilities and attainments',

RAVENETTE, A. T. (1968) Dimensions of Reading Difficulties, Pergamon

SAMPSON, O. C. (1966) 'Reading and adjustment: a review of the litera-

SCHONELL, F. J. and WALL, W. D. (1949) 'Remedial Education

SHEARER, F. (1967) 'The long-term effects of remedial education',

Educ. Res., 9.3, 219-22. 101

Remedial education: programmes and progress

- SHEARER, E. (1968) 'Physical skills and reading backwardness', Educ. Res., 10.3, 197-206.
- TANNER, J. M. (1961) Education and Physical Growth, University of London Press.
- VALENTINE, H. B. (1951) 'Some results of remedial education in four Child Guidance Centres', *Brit. J. Educ. Psychol.*, 21, 145-9.
- VERNON, M. D. (1960) 'The investigation of reading problems today', Brit. J. Educ. Psychol., 30, 146-54.
- VERNON, M. D. (1968) Backward Readers. Guide Lines for Teachers, no. 4. College of Special Education.
- VERNON, M. D. (1971) Reading and Its Difficulties: a psychological study. Cambridge.
- VERNON, P. E. (1958) 'The relation of intelligence to educational backwardness', Educ. Rev., 11, 7-15.

12 Results of a reading 'drive' Paul Widlake

A survey of some inner city schools using an NFER sentence reading test with a mean of 100, a standard deviation of 15 and a range of 70-140, produced the following data.

Table 12.1
Reading in five inner-city schools – standard score by school –
July 1969

School		N	mean	s.d.
Junior and infants	A B C D	206 70 120 117	81·59 85·04 83·16 82·38	11·18 12·12 13·28 10·92
Junior	E	147	88 · 24	14.26

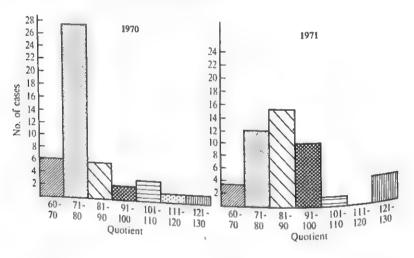
Table 12.2

NFER reading test standard score by age – five inner-city schools, July 1969

Age (months)	N	mean	s.d.
96–101	23	76·56	6·00
102–107	83	84·34	12·80
108–113	141	84·10	12·26
114–119	162	84·06	12·67
120–125	137	84·42	13·48
126–131	92	84·72	12·08
132–137	13	76·46	10·50
138–143	7	83·71	16·08

In an effort to improve the literacy situation, a 'reading drive' was initiated. A wide variety of materials was made available to a particular school (SRA reading laboratories, 'Breakthrough', audio-visual and home-made apparatus) and continuous in-service training was attempted through the secondment of a remedial specialist to the school for a year, full-time.

Table 12.4
Schonell GWR test quotients, July 1970-71
School A: 8-year-olds, whole group



An attempt was made to quantify the results of this 'reading drive'. The simplest procedure was followed: reading achievement among eight— and nine-year-olds was assessed on a standardized reading test (the Schonell Graded Word-Recognition Test) in 1970 and again in 1971. There are obvious objections to a single test, measuring only one aspect of reading; against this, are the advantages which accrue from employing a well-known test, already in normal use in the schools and used in other research with which comparison would be valid (e.g. Clark in Dunbartonshire). There was substantial wastage during the year, particularly in School A, which was in a redevelopment area, and only those children are included who remained throughout the year. This could have some bearing upon the results, in that the more enterprising families were,

perhaps, the more likely to go. On the other hand, the reduction of class size operated to the advantage of the children who remained.

School A

Of the seventy-three children who were tested in July 1970, forty-five remained in July 1971.

Table 12.3 Schonell GWR test quotients, July 1970-71 School A: first-year junior children (8-year-olds)

	1970		1971	
	mean	s.d.	mean	s.d.
Whole group	80	12-41	87	14.39
Whole group minus Asians Boys Girls	84 79 80	14·00 12·49 12·37	91 86 88	16·28 17·26 11·70

The group as a whole made a gain of seven points. It is interesting to note that without the Asian children, the mean gain was the same but the 1971 quotient was four points higher and creeping towards the norm. Both boys and girls made similar headway. Though an enormous amount remained to be made up, the general rise in reading standards was very encouraging.

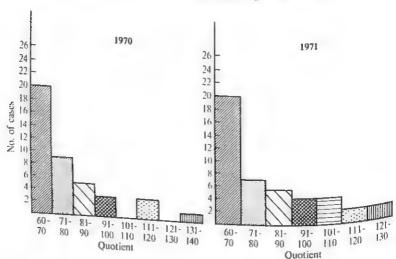
This year group had one teacher who was particularly keen on the use of the SRA reading laboratories; another who made good and enthusiastic use of the Breakthrough material; and they received some help from the remedial consultant. Whether or not these were determining factors in producing the modest upsurge in reading standards, the result differed rather sensationally from those of the second-year juniors:

Table 12.5
Schonell GWR test quotients, July 1970–71
School A: second-year junior children (9-year-olds)

	1970		197	1
	mean	s.d.	mean	s.d.
Whole group Whole group	76	17-69	77	21-14
minus Asians Boys Girls	77 78 74	19·87 19·31 16·34	78 80 76	18·11 19·08 15·33

When expressed graphically, the lack of progress of this year group is even more apparent.

Table 12.6
Schonell GWR test quotients, July 1970–71
School A: second-year junior children (9-year-olds)



Not one of 1970s non-readers had improved by 1971. A few from the 71–80 group had moved slightly and the increase in standard deviations indicates that a very slight spread in the 106

achievement scores had occurred, but the whole group mean improved only one point from 76 to 77, and the presence of Asian children had virtually no effect. There were no significant sex differences.

Since there had been a loss of twenty-seven out of seventythree children during the year, the mean scores of the whole year groups as they appeared on the registers were computed (Table 12.7):

Table 12.7

	N	M	s.d.
1970	73	75	12·08
1971	56	84	15·03

The standard of reading in 1971 was in fact nine points higher than in 1970, so there is support for the view that the non-readers were a residual group. The fact remains that, despite a range of materials, despite discussions, smaller classes, a full-time remedial consultant, classroom aides and new buildings, none of the most difficult second-year children were brought towards literacy.

School B

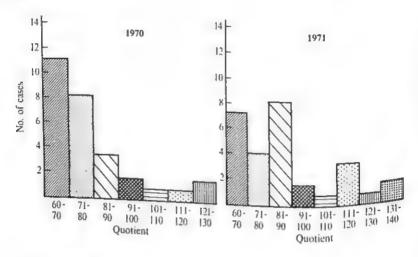
Curiously enough, the pattern was identical in the other school, but with the year groups reversed: that is, good progress was made by the second-year juniors, virtually none by the first year.

Table 12.11

Schonell GWR test quotients, July 1970-71

School B: second-year junior children (9-year-olds),

whole group



Conclusions

It is possible to influence the literacy position through remedial work at junior school level. Encouraging gains of seven and ten points were recorded for the eight-year-olds in one school and the nine-year-olds in the other: capacity to respond to remedial teaching is not apparently determined by age, since the older group improved more.

The complete absence of progress which appeared in the results of one group of eight-year-olds and one group of nine-year-olds in each school seems to indicate that success or failure in learning to read is closely related to the performance of the teacher. Materials, ideas, advice and support of all kinds others did not.

Several important pieces of research have pointed to the dominance of the head and teachers among the factors that can determine reading achievement (Morris, 1966; Southgate, 1966). The present findings concur: no other single factor has the weight and significance of teacher performance.

References

MORRIS, J. M. (1966) Standards and Progress in Reading, Slough, NFER. SOUTHGATE, V. (1966) 'A few comments on "reading drive", Educational Research, 9, 145-6.

Early intervention

Prevention is better than cure; about this, there can be no disagreement. Britain has a longer history in nursery education than is generally known, but provision is patchy in a geographical sense; it can be argued that the extension of nursery education should take priority over other forms of educational expansion, especially in the educational priority areas defined by the Plowden Committee. Unfortunately, the recurring British financial crises make it unlikely that any such policies will be implemented. This is doubly unfortunate because there are some grounds for optimism about the effects of carefully planned programmes (Widlake 13 p.113). At least we can make the best of such provision as there is; remedial teachers should take a leading part in encouraging early learning. Nursery schools and classes are excellent places in which to begin the process of involving parents in their children's education; they are also, because of their small scale, suitable for ambitious experiments in organization such as family grouping and the integrated day (Pont 14 p.121) which have a special relevance for less able pupils both at this stage of their education and later. 'The resulting stimulating and secure atmosphere is likely to be beneficial to all children, and because there is more chance of a longer and unbroken child-teacher relationship, regression and severe behaviour problems will be less apparent.'

13 Language and learning in the pre-school Paul Widlake

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Part of the work of the EPA projects was concerned with an experiment which tried to increase the amount of child—adult interaction through the use of the Peabody Language Development Kit. This is a collection of materials designed primarily, in the words of the authors, to stimulate the receptive, associative and expressive components of oral language development. Concomitant goals are to improve intellectual functioning and to enhance the possibility of future school progress. The Kit consists of 180 daily lessons, set out with a host of practical suggestions in a Teacher's Manual, and supported by a large and comprehensive collection of audio-visual aids, all splendidly housed in two orange-coloured, metal boxes.

Like any collection of teaching aids, some of the material is good, some bad, some indifferent. Nursery teachers and playgroup personnel will react at various levels of enthusiasm to the suggestions for oral work (no other kind of work is involved) and to the puppets, pictures, plastic fruit, recordings, Mr P. Mooney's magic stick and the rest. There is almost complete unanimity in the reaction against a programme which is teacher-centred instead of child-centred.

The objections raised depend upon value-judgements not, perhaps, immediately apparent to those who are making them. Those in authority in the nursery-school world seem to have accepted the following statements as factual:

 Communication is important, 'language' is essential and therefore all good nursery schools and playgroups provide adequate language stimulation situations.

2. All nursery schools and classes and all playgroups fall within the category 'good'.

3. There is a definition of nursery education which is generally known and understood by all practitioners; this sets a pattern which is the best of all possible forms of pre-school programmes because it is based upon the child's 'needs'.

It is applicable across the board to all social classes.

4. This 'programme', though generally understood and applied, is not a 'programme' in the evil sense that it implies any direct intervention by the teacher. Nobody who really understands the role of the teacher would ever suggest a 'structured' approach, in which there is direction by the teacher.

All pre-schools are like 'good' nurseries

This assumption is absurd, as anyone knows who has had occasion to visit large numbers of pre-school groups. Nobody holds this assumption, in fact, but important decisions are taken which make it appear to the outsider that this assumption is being made. Once it is admitted that playgroups, for example, differ enormously in their physical facilities and in the quality of their staff, it would seem logical to propose somewhat different solutions to meet local and personal requirements. This is the way in which other levels of the British educational system have developed: it would be curious if the most creative sector of the last half century were now to become inflexible and dogmatic, but there is some danger of this, apparently.

A 'structured' approach is incompatible with the traditional role of a nursery teacher

The difficulty here seems to be the interpretation which is placed on the word 'structure'. Many experienced nursery and infant teachers have felt able to accede to the principle set out by Dorothy Gardner in *The Role of the Teacher in Infant and Nursery School:* 'That good teaching consists of a carefully thought out balance between respecting the purpose of children and giving necessary help, balance and control.'

She supports this statement by quoting from Melvin (1946):

It is in the initiation of activities, if anywhere, that the teacher should keep hands off. Here more than anywhere else the teacher should wait for the children's responses. But is a teacher a passive agent even here? Far from it. She has already been active in preparing an environment

which abounds with various stimuli to activity. She is active in awakening needs. Furthermore she arranges situations for discussion during which needs may be brought forward, recognized and evaluated and in the progress of which they may issue into purposes.

The next principle for which supportive evidence is adduced by Gardner is yet more positive: 'That progressive teachers are aware of the need at times to exert direct influence and control.' Now, no one is likely to classify Dr Gardner as a reactionary; yet her views are in contradiction to those of certain nursery 'authorities'. A group of playgroup leaders recently spent a large part of a one-day conference in discussing whether it was a breach of nursery school ethics to bring the children together as a group to drink their milk. Without, apparently, acknowledging any contradiction, the same leaders regularly bring their children together for 'story'. Several nurseries visited by the present writer, had constituted an 'Up Group', which was preparing the children for the more 'formal' infant school.

There is a case for 'structure' in this sense and it is not at all clear how anyone could fail to observe that some of the playgroups in the present experiment were much more teacher dominated than others. Nor could one's estimate of the quality of the work being done be predicted from a prior knowledge of the type of régime favoured by the pre-school. There were both good and bad pre-schools where the teachers seemed more dominant or vice versa.

Unpopular programmes

The structured programmes to which such exception was taken, were those which predetermined the cognitive progress of the child with what was held to be, a callous disregard for his social and emotional well-being. The strength of such feelings can be estimated by comparing the titles of two successive annual conferences of the Nursery Schools Association: New Opportunities for Young Children (1968); and The Exploitation of Young Children (1969).

It was programmes associated with the names of Bereiter and Englemann which worried the nursery teachers, as indeed, It is applicable across the board to all social classes.

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the authors intended. Yet the violence of the reaction to this piece of provocation was rather disturbing; the genuine insight of the language sections was lost in a sea of passion. Dr Gardner's principles might never have been stated.

The present investigation hoped to throw some light on the efficacy of a modest and reasonably enlightened attempt to provide guidance to teacher and child, most particularly in oral language. It was a source of disappointment that there was so little enthusiasm for research. The suspicion could not be altogether allayed that there was some confusion between the Peabody material and the much resented Bereiter and Engelmann; but there was a much deeper feeling of resentment, directed towards any systematic body of teaching principles that was not in accordance with 'orthodox' thinking.

However, there were many whose misgivings were based upon genuine causes of concern; for example, the unsatisfactory presentation of many of the PLDK items when considered aesthetically, or the dangers of so specific a teacher's manual in the hands of a dull or unimaginative teacher. It was the moments of contact with open-minded workers of this kind that provided some promise of a serious consideration of the following proposition.

Language work in pre-schools is adequate

Every textbook on nursery education contains a section on 'language'; there is a general acceptance of the importance of communication and a general assumption that the average pre-school provides an adequate language stimulation situation. Observations of typical nurseries and playgroups must

lead to a questioning of this assumption.

Admittedly, as soon as an observer is introduced, the child's behaviour changes to some extent; as when Mary commented to the person recording her words and actions 'You've wrote all that', and in her general 'showing-off' behaviour. The account is accurate enough for all that. In fact, the teacher's interjections were probably *more* numerous than usual, since the purpose of recording the child's conversation could hardly have escaped her. The régime is kindly, but detached; the children's play is purposeful and constructive, but there is no

particular attempt to establish a verbal environment. Most of the teacher's remarks were intended to modify the child's behaviour, and such 'prohibiting' remarks, as Dr Tizard (1970) has noted, tend to reduce conversation rather than encourage it.

The children speak freely to one another and it is the peergroup interaction which gives a visitor the impression that nurseries are full of conversation. Conversations recorded are evidence that much of the talk is constructive, the structures sophisticated and the vocabulary substantial. However, it is mainly between the children. The role of the teacher is to facilitate play and to intervene actively when the play breaks down. Of course, some nurseries are very conscious of the importance of speech, but the models used by the children are still mainly provided by other children.

This arrangement is not supported in the recent writings of two well-known researchers:

If association with adults is a factor facilitating language development (McCarthy 1930) it is understandable why institutionalized children show marked retardation; they associate much more with other children, especially contemporaries, and have far fewer individual contacts with, and attention from, adults (Kellmer Pringle, 1965; p.37).

Nisbet (1953), in a study of some 5,000 children, has shown that irrespective of the socio-economic level, to be born into a large family may still have a retarding effect on linguistic development. We must conclude with him that this occurs because in a large family a child may be relatively deprived of adequate linguistic intercourse with adults (Lewis, 1969).

Both Kellmer Pringle and Lewis, therefore, see child-adult interaction as the key to speech development. The same point was made by Tizard (1970): 'In nurseries where the children's language development was highest, the staff spent much longer actually communicating with the children – playing with them rather than simply supervising them.'

This seems to dispose of the illusion that all nurseries and playgroups deal adequately with the language requirements of their children. Nor is it obvious on what 'educational' grounds, structured approaches to languages can be rejected.

There are obvious and adequate educational grounds for rejecting the régime advocated by Bereiter and Engelmann, which countenances such malpractices as beating maladjusted children; but these will not serve to justify the rejection of all structured approaches. Kastein and Trace (1966) described a structured approach to the education of a non-communicating child which, though rigorous in the extreme, proved lifegiving. Blank and Solomon (1968) used a system involving a one-to-one relationship between pupil and teacher as an alternative to the philosophy of total enrichment. Finally, evidence collected in the USA has indicated that, when results were positively in favour of an intervention programme, it was more often than not a programme with carefully defined objectives:

'Language is central to the development of the child's intelligence... we need to be bold and confident in the planning of language instruction rather than, as the tendency is, to maintain that the teacher's role is to observe, to wait on the process of maturation, rather than to anticipate and actively to intervene and to promote their emergence' (Lewis, 1969).

The Birmingham EPA pre-school experiment

With so many diverse opinions and research findings extant, it was obviously worthwhile setting up a further investigation into the effects of intervention programmes on the language of pre-school children. A full account of this work has appeared elsewhere (1973); the following summary offers some support for those who do not believe that language will be 'caught' by mere exposure of the children to pre-school influence, but good English nursery schools obviously do take a dynamic attitude towards language development, and this is reflected in the results.

Two hundred and eighty children were pre- and post-tested on the Reynell Development Language Scales and the English Picture Vocabulary Test. They were taken from thirteen playgroups and nursery schools and were exposed to three treatments: $T^1 = Peabody$, $T^2 = a$ number programme (to offset 'Hawthorne' effect) and $T^3 - Controls$.

Results and conclusions

- The pre-school children in this educational priority area were part of a very mobile population and this fact must have a bearing upon any work intended to improve their linguistic performance.
- 2. There was a difference of fifteen points on the English Picture Vocabulary Test scores of the twelve educational priority area pre-schools and that of a 'middle-class' pre-school, which was used as a control. Even after a year's language intervention programme in the EPA pre-schools, this gap remained substantial; the EPA standard had still not reached the starting point of the 'middle-class' pre-school.

Conclusion. It is certainly possible to bring about a substantial improvement in the language performance of children in an EPA, but it would be unrealistic to assume that all social class effects could be eliminated. However, in this context, 'middle class' may refer more to parental attitude towards education than to other attributes of social class; and there are good prospects of modifying unfavourable parental attitudes, as the excellent LEA nurseries demonstrate.

3. Experimental finding. All the nurseries showed improvement on all language measures and there were no overall significant differences between those using the Peabody material and those following a traditional nursery régime; there were, however, some differences in favour of the Peabody material.

Conclusion. Traditional nursery procedures are effective in producing language gains, but would be yet more effective if there were more child-adult verbal intercourse, and if the adults were more vividly aware of the processes by which language improvement could be effected.

4. Experimental finding. The Peabody Playgroups were significantly better than the Control groups, one of which had lower mean scores than at the pre-test.

Conclusion. A structured intervention programme could help playgroups to bring their standards of language work near to those of nursery schools.

5. Experimental finding. The Number Programme produced gains at a very high level of statistical significance in the nurseries, despite rather adverse conditions. Scores on some of the language tests in one of the nurseries declined between pre- and post-test.

Conclusion. It is possible to accelerate deprived children's acquisition of number concepts, and this is not necessarily dependent upon a corresponding improvement in language.

References

- BEREITER, C. and ENGELMANN, F. (1966) Teaching Disadvantaged Children in the Pre-school, Prentice-Hall.
- BLANK and SOLOMON (1968) 'How shall the disadvantaged child be taught?', Child Development, 40, 47-61.
- GARDNER, DOROTHY (1965) The Role of the Teacher in Infant and Nursery School, Pergamon Press.
- KASTEIN, S. and TRACE, B. (1966) The Birth of Language, Illinois, Thomas.
- LEWIS, M. M. (1969) 'Language and mental development', in E. A. Lunzer and J. F. Morris, eds, *Development in Human Learning II*, Staples Press.
- McCARTHY, DOROTHEA (1930) 'The language development of the pre-school child', Institute of Child Welfare, Monogr. Ser. no. 4, University of Minnesota Press.
- MELVIN, A. G. (1946) The Activity Programme, New York, Macmillan; quoted by Gardner.
- NISBET, J. D. (1953) Family Environment: A Direct Effect of Family Size on Intelligence, Cassell.
- Peabody Language Development Kit, Level + P NFER.
- PRINGLE, M. L. K. (1965) Deprivation and Education, Longmans.
- TIZARD, J. (1970) Report in Times Educational Supplement, October 1970. WIDLAKE, PAUL and BELL, LORNA (1973) The education of the

14 Family grouping in an infant school: a way of integrating handicapped children D. E. Pont

In recent years there has been a growing interest in the organization of family grouping in the infant school. This system of classroom organization is a familiar one in small country schools where children, often from five to eleven years, are grouped together in one or two classes. References to the success of mixed age grouping in the small village schools in the Plowden Report have inspired some infant head teachers in urban areas to investigate this particular structure of educating their children. The writer has had some experience of grouping among five- to seven-year-olds and considers it a challenging and satisfying method for both teacher and children, and of particular benefit if there are children who have special needs.

In an infant school children are not expected to conform to a stereotype pattern of behaviour and development. The majority of those schools adapt their methods to the abilities of the children. Children develop at different rates and at the infant school stage there is a particularly wide range of needs. More than in any other school a teacher will meet with a comprehensive group of children representing a variety of physical, mental, intellectual and social stages of development. This is a tremendous responsibility, and a high degree of educational skill is required to cope with such a task.

At five years old every child in Great Britain has to take a major step – he leaves home and begins school. Many children look forward to starting school, having heard about it from parents, brothers, sisters and friends. In the majority of cases

a child comes from a family atmosphere, however small, into a class consisting of new entrants. Sometimes this may mean as many as forty children, all needing the attention of one or two adults. Most will bravely cover up any feeling of insecurity and bewilderment while they are in school, and gradually adjust to the new demands made on them. A few will appear completely confident whilst others will be openly disturbed, but it is difficult to assess those whose anxieties are really being concealed.

Entering school with a large number of other children of a similar age and being put together in one class appears to some teachers to be time wasting. Supporters of family grouping claim that in this traditional situation adjustment to routine takes longer and it also provides a less natural atmosphere for the child than a family grouped class. Those children who come from secure families recognize in a family grouped class a relationship similar to their own home life. Only a few new entrants are taken at any one time into class which has a ready established, secure routine, and most of the children are ready to welcome newcomers. This way they can add to their own personality development by giving attention to a younger child. To those unfortunate children who do not have such secure homes a family grouped class can immediately present a secure and established situation into which he may be rapidly absorbed. In this context family grouping enhances and sometimes replaces a poor cultural environment, helping to provide a mastery of vocabulary and an emotionally satisfying stability.

Parry (1971) says: 'The concept of education as a purely academic function is no longer the case. Early social relationships are vital in the understanding of human beings.' He also says: 'The uniqueness of each child must be fully acknowledged.'

It is essential that the educational environment in which the child develops should make the maximum possible contribution to his total growth. All good infant schools provide this environment but the regularity with which confidence and happiness pervade the family grouped class has been found to be of marked significance. Because of an unbroken continuity of teaching, and the continuing adult—child relationship,

an extended atmosphere of regard and encouragement over a period of two to three years can provide a climate wherein any child should be able to grow in independence. Many teachers will take the view that a bright child will get on anyway, but in a group of children where there are bright children of all ages, those who are younger can be encouraged to go ahead more swiftly, striving to increase their own knowledge by emulating the older brighter ones, who are in turn being stretched according to their own needs. A slow learning or insecure child similarly can receive help and support with his difficulties, diminishing the feeling of being left behind because there are always those coming on who, in turn, even if only for a short time, need his help too.

The 'middle-of-the-road' child, repesenting the majority of infant children, will only reap maximum benefit from an established and stable class atmosphere. Periods of regression are minimized because there is less frequent changeover of teacher or classroom. Behaviour problems are less apparent as there are insufficient children of any one age group and type to exhibit behavioural patterns associated with particular age groups. In any case a properly organized class of this type will have sufficient equipment and interesting activities to tempt even the most recalcitrant child to commence discovering something for himself.

Such organization inevitably means that methods of teaching have to be very specially thought out. A certain amount of teaching has to be done in groups. These obviously need to be fluid, related to ability rather than age, though the older child may tend to be conscious of his physical development in comparison with the younger. Nevertheless, the writer's experience has shown that a slow older child may work with a younger group without feeling too much left behind. Similarly a bright younger child may work with older children with all this means in responsibility carrying out subsequent assignments in connection with teaching time. Since physical development in size is varied in children it is unlikely that this would constitute a major problem.

Parents

Pressure from parents can easily make a young teacher feel that a child should be 'getting on' to a certain stage by a certain age. A class organized on the family group system has the effect of lessening the strain on the teacher as she has only a small group of children whose needs are similar at any one stage. The seven-year-olds have to be stretched and prepared for the junior school – sometimes not linked in any way with the infant school. The six-year-olds need special help with consolidating knowledge of skills acquired during their first year. The five-year-olds have to settle down and develop interests and skills, and generally overcome any tiredness and timidity. The free overlapping of these stages and the subsequent relaxed atmosphere, allow a teacher to use her skills to the full in dealing with individual children.

Records

Careful and up-to-date records on each child and a diary of group work help to eliminate any suggestion of haphazard ideas. The orderly framework of a class is very necessary to give the children security and encourage them to become self-disciplined.

Every child of five who is not grossly physically or mentally handicapped will come to an infant school. Many who may later need special educational treatment: the slow learner, physically handicapped, neglected children, the immigrant and others with speech and language difficulties, arrive in an unsorted and probably undiagnosed group. In most classes there is at least one such child, and in some areas a large proportion of entrants will have difficulties. A small intake into a class ensures that special needs are more quickly recognized, and because class routine has already been established the teacher can take appropriate actions to encourage the older

children to practise their self-discipline in attending to their assignments. Similarly the social skills come into play in integrating a child who needs just such a stable atmosphere. Although it has often been claimed that it is difficult for anyone to enter a group situation where the rules and standards of behaviour have already been established, the skills of the teacher come into play in aiding absorption into the 'family'.

All children have to learn to live in a world of people and it seems unreasonable to exclude a child from such an integrated situation as is provided in a family grouped class if he is not so handicapped or delicate or disturbed that education in a special school is the only possible course to take. Apart from the fact that either of these disabilities may not be diagnosed until school has been commenced, a broad and unspecialized approach to education may have the effect of reducing any difficulty due to these problems and possibly avoiding result-

ing behavioural problems.

Whilst it is recognized that generalization is unwise and inconclusive, the encouragement to a teacher who has observed positive reactions in a family grouped class is of value in itself. During a period of six years spent in one school the writer has had experience of three years' traditional grouping and three years' family grouping. During that time records were kept of all children. At the time of the children's promotion to the junior school, reading ages were tested on the Holborn Sentence Reading Scale. Of the children who went to the junior school from the family grouped classes only one recorded a reading age of under six and a half years, and only four others scored a reading age below that of their chronological age, from a total number of sixty children. From the one traditionally grouped class which entered the junior school as a complete group, having been taken right through infant school by one teacher for two years, twelve children had reading ages below their chronological age out of a group of forty children. Eight of these scored below 61/2. In another class, inherited by the writer from two previous teachers, half the class scored a reading age below their chronological age, though at this time the Holborn Test had been replaced by the Schonell Word Recognition Test which is known to produce

a lower reading age score than the Holborn.

In the family grouped class the lowest score was recorded by a child who had been born with hydrocephalis and spina bifida. He had been integrated into the school on the request of the parents who wanted him to have as normal a social experience as possible before accepting that it was inevitable that he should be placed in an ESN school. This child spent a total of four years in the school, three of them in a family grouped class, where he was liked and accepted by all the children. During the same period of family grouping an elective mute was encouraged to read sufficiently well to be able to score only a few months below her chronological age. This child would probably have received very much less personal attention in a traditionally grouped class.

Behaviour difficulties were reduced and quarrels quickly settled because older children protected younger members of the class, particularly in the playground. Learning difficulties assumed less gigantic proportions with older children consolidating their own knowledge by passing it on to others, and slower ones unconsciously seeking other children's help in understanding certain problems, either just by watching or

by actively participating.

On promotion to the junior school the children from the family groups appeared on the whole to settle down more quickly and were able to make contact with a number of children who had 'gone up' from their own class the previous year.

It is a tremendous task to meet the everyday needs of normal children in an ordinary classroom situation. A family set-up goes a long way to stimulating both child and teacher to realize their maximum potential.

Disadvantages

There are some aspects of family grouping which could be considered disadvantages. Larger classes of over thirty children become unwieldy to manage and a 'helper' is necessary. While some parents like the idea of brothers and sisters from one family being together in one class, sometimes the younger child becomes dominated by the older and is unable to develop

freely. In this case a child could be moved to another class without the stigma of 'being moved down'. It can be said that family grouping is a time-honoured method of education which has been successful in small country schools for many years, and has now begun to take its place among the urban schools of our country. It presents a major challenge to the teacher's organizing skill and must be carefully planned to ensure classes are not too large as to become unmanageable.

The resulting stimulating and secure atmosphere is likely to be beneficial to all children, and because there is more chance of a longer and unbroken child-teacher relationship, regression and severe behaviour problems will be less apparent. Providing the teacher is aware of the individual needs of each child and is able from time to time to call together groups of children who have similar needs, and give them meaningful activities, then family grouping can be considered a serious attempt to adapt methods to the needs and abilities of all children who are admitted to these classes.

References

AUSUBEL, D. P. (1968) Educational Psychology: a cognitive view, Holt, Rinehart & Winston.

BLACKIE, J. (1967) Inside the Primary School, DES.

BOURI, J. and BARKER, J. (1968) A Study of Grouping in Small Junior Schools, NFER.

PARRY, J. (1971) The Provision of Education in England & Wales: an introduction, Routledge & Kegan Paul.

RIDGEWAY, L. and LAWTON, I. (1968) Family Grouping in the Primary School, Ward Lock Educational.

WEBB, L. (1967) Children with Special Needs in the Infant School, Collins.

Remedial education in primary schools

State schooling in Britain is complicated by the use of different terminologies. Primary schools have generally been taken to include children from five to eleven years, sometimes under one roof, sometimes in separate infant and junior schools.

Until recently all children were divided by an eleven-plus examination before entering secondary education in either a grammar school or a non-selective school (except for the small minority whose parents can afford private education). Most LEAs have now abolished formal selection but many continue to maintain selective schools, even, in some cases, alongside so-called 'comprehensive' schools. Secondary schools have their own range of mystical terminology, which will be touched on in the next section; one has to be aware, however, of another set of administrative arrangements which keep children together through 'first' schools (5–9 years) and middle schools (9–13 years).

Remedial education in Britain has concentrated on children aged seven to nine years. Usually remedial education services have become involved when children move from the 'infants' to the 'junior' school department. Thus Howel Jones and the West Bromwich remedial service were breaking new ground when they actively intervened in 'infants' schools, as also when they concentrated their efforts on the improvement of class teaching rather than on individual children in a clinical setting. This practice is now widespread but the techniques are as valid as ever. Materials for this age group are freely available, and the article by Pope (16, p.140) gives a clear account of 'traditional' remedial education.

15 Remedial approaches

Howel Jones

Preventive techniques in the infant school

One of the common characteristics of remedial teaching is the conviction that aid, however skilful and appropriate, is often either too late or too limited in its scope. Consequently the remedial teacher is concerned with methods of prevention which would alleviate the problem by tackling root causes more effectively. His aim is to do this in a way that would affect more children in a school than the exceptional cases which he is normally called upon to deal with. Remedial teachers with the West Bromwich Child Guidance Service have been concerned with this problem for some time and are at present engaged in an experimental project, designed to enhance pre-reading skills, in one of the large infants' schools in the borough.

It was found that children of average intelligence were entering the junior school with very poor reading ability and inadequate learning habits. Consequently much of the junior school time was spent in teaching these children to read when it could have been profitably spent on other activities.

Seventy-five per cent children failing

On the other hand, its was found that the infant school approach was quite enlightened and adequate. A fully qualified, enthusiastic teaching staff provided a stimulating school environment. Even so, nearly seventy-five per cent of the children appeared not to benefit from this to any appreciable degree and so it was suggested that in view of the depressing nature of the school neighbourhood, the children themselves were not mature enough for such experiences and were therefore unable to make the best use of this environment for their cognitive development.

An experimental class of top infants was formed which contained eighty per cent of children who had failed to make any progress in reading. Thus it was decided to postpone the teaching of reading as such and introduce them to a carefully structured programme of compensatory activities designed to stimulate and develop their cognitive ability and to inculcate readiness for, and aptitude in, learning. The programme comprised detailed schedules of activities in four main areas:

- Motor coordination: e.g. gross body movements: emphasis on body image; identifying body parts; positioning body in relation to other objects; manipulation around and among obstacles; rhythmic movements; coordinated unilateral and cross-lateral movements.
- 2. Visual perception: e.g. observing major critical features; matching shapes, colours; discriminating between dissimilar forms; figure-ground discrimination; reproducing shapes, colours from copies; producing formations from visual recall; sequencing and arranging pictures, shapes in order.

Allied to this section there were also visuomotor activities, e.g. drawing shapes with guide lines; tracing; writing patterns; formation of letter shapes; hand writing exercises.

- 3. Auditory perception: e.g. great stress was laid on listening for sounds of common objects, animal noises, linking sounds with objects; letter sounds; rhythms and sound sequences; listening and responding to instructions, these gradually becoming more complex; arranging statements in temporal order and spotting omissions and discrepancies in statements.
- 4. Language development: extension of vocabulary by naming objects, actions; introduction of simple sentence patterns; enrichment of statements by introducing adjectives, adverbs, followed by phrases and clauses; encouraging verbalization of actions, bringing in correct inflections and linguistic formations with parts of speech which stress relationships (prepostions, comparatives, etc.); free discussion; linked sentences; themes and topics.

Implementing the programme

These compensatory activities occupy the greater part of each morning; afternoons were given over to freer traditional

activities. The relevant items from the various sections of the programme were grouped in a series of units which provided enough work for a period of two or three weeks at a time.

Two factors were considered vital to the effectiveness of

the programme.

(a) Having failed to benefit from previous experience with similar apparatus, there was now a need to guide them in noticing the relevant features, and thus be initiated into the habit of learning by active interaction with the environment. Hence the teacher tended to dominate the situation in the early stages, in her role as guide and verbal mediator.

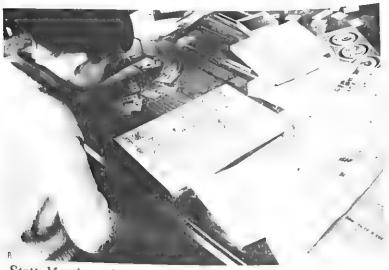
(b) Random experience had proved ineffective and therefore there was need to structure the activities and apparatus into a carefully thought out developmental sequence. This was done by the visiting remedial and advisory teacher.

There is very little doubt that this stress on observation, listening and guided activity on the one hand and involvement in sequential tasks on the other, has resulted in greatly improved attentional ability and progress. Some have already shown a great desire for reading and these have now been taken off the programme and are making considerable progress in this direction. The programme as such covers only two terms, the third being given over to an intensive period of teaching of reading to children who are much better prepared for, and more eagerly desirous of, learning to read.

The next step envisaged is the formation of a two-year transition unit for the final infant and first junior years. Children who reach the end of middle infants without being able to 'read', i.e. score on a recognized graded word recognition test, are transferred into this transition unit where the first two terms will be taken up with compensatory activities as outlined above. The teaching of reading will then be introduced in the third term and continue into the first two terms of the junior school. It is anticipated that success will then have been obtained, so that the final term of the first year will provide for integration into normal junior school activities.

Class remedial programmes in the junior school

Remedial teachers are often asked for advice as to what to do with groups of poor readers scattered in different classes. The ideal preventive measure is to tackle the problem in the infants' school so that reading failure is dealt with as far as possible before the children enter junior school. This, however, is not often the case and one frequently finds schools with an extensive reading problem. Where there are sufficient numbers of children in one age group it may be possible to set up a remedial class – a strategy which has as many disadvantages as advantages. It often happens, however, that there are not enough children, nor is it desirable, to form a remedial class as such and yet the problem is just as acute.



Stott-Morris cards

Withdrawal groups

One approach is to withdraw children from their classes in small remedial groups which, in turn, are taught by either a specialist remedial teacher or, as so often is the case, by an unqualified helper. Although the work done in such groups is often quite commendable, it can at best only be regarded as an emergency temporary measure, for a school is obliged to meet the needs of all its children and not regard the slow-learning non-readers as an embarrassment to be treated in this unobtrusive manner.

Thus the problem should be considered as one that obtains within the class and within the school; yet there are a number of factors which complicate the issue. The one has to do with numbers, for classes are still far too large for a teacher to cope adequately with each child. (Not a few remedial teachers have become such by the fortuitous occurrence of being given a small class.) Secondly, the existence of a reading problem in the junior school still comes as a rude awakening to newly qualified teachers. The disillusionment that follows abortive attempts to develop creative writing by their pupils is frustrating.

Help for frustrated teachers

It is therefore with a view to helping the frustrated teacher with a percentage of reading failures in the class that the West Bromwich Child Guidance Service has sought to devise a comprehensive programme of class activities which facilitate the teaching of reading to children at different levels within the class. This has been done by the careful programming of related material from several published schemes and supplemented by teacher-produced apparatus. The material is grouped in three parallel sections:

1. Perceptual activities leading to a multisensory readiness and aptitude for reading.

2. Sight vocabulary (Look and Say) approach, seeking to

establish a good stock of Key Words.

3. Phonic skills which facilitate the reading of difficult, less common words.

Ideally, the perceptual should precede the sight and phonic approaches (as it does in the infants' preventive programme see p.129). However, as an emergency feature it is useful to include it here. Each section in turn is graded into stages: Perceptual

(a) Discrimination.

(b) Composition: making wholes from discrete components.

(c) Sequencing: arranging items in a specified order. The sight vocabulary apparatus (of which there is an abundant supply)

133

Remedial education: programmes and progress



Making a story book

(a) Picture-word matching of common words.

(b) Key words sight vocabulary – the recognition of most of the 300 words that make up seventy-five per cent of children's reading.

(c) Sentence reading and reading of simple captions and pictures.

(d) The beginning of consecutive reading leading into the reading of parallel graded readers.



Picture-word matching cards

(e) Fluent reading, concentrating on comprehension and enjoyment.

The phonic apparatus consisting mainly of the Stott Programmed Reading Kit

- (a) Letter sounds.
- (b) Initial blends.
- (c) Regular single syllable phonic words.
- (d) Irregular forms such as long vowels and digraphs.

(e) Irregular, inconsistent phonic forms.

Each of the three sections has a distinctive colour code and each item within the section is numbered in sequence. All the material is kept in numbered containers, e.g. large envelopes, suitably coloured and numbered, in a central position for ease of access. In the meantime, the children who are in reading difficulty have been assessed, in this case by the visiting remedial teacher in consultation with the head teacher, and a starting level has been decided upon. The child is given the number of the step in each section where he is expected to begin and then goes to the appropriate box to obtain the numbered item and proceeds to use the apparatus. In some cases written work is linked with the activity and various forms



Vowel digraph cards

of recording act as reinforcement. Most of the apparatus is self teaching, so that during this time the teacher keeps a supervisory check on what is going on. Using the apparatus provides the learning situation and requires practice. The recording of progress is done by the children using special record sheets. Against the number of the item there are several spaces which a child colours as he completes each practice, with a further space to denote completion of that item, which would normally follow the required number of practices. When the teacher is satisfied, he is moved on to the next item. The teacher keeps a class record of progress through items.

Children should have daily practice of about thirty minutes on each of the sections, especially the sight and phonics. There is little danger of conflict between these two methods as they are so arranged as to supplement each other, e.g. while the emphasis in stage (a) is on Look and Say, the phonic technique stressed at that level is initial letter sounds which greatly facilitates Look and Say by stressing the initial sound clue at the beginning of a word.

One advantage of such a system is this: that the remedial kit once having been compiled can be kept in a central space and used by different classes in turn. It would be expected that the first year classes would need to make most use of this



Part of the kit being transported

and so they would be given priority. Yet there may be a number of children in second, third or fourth years who still need help at different stages. By common agreement, these children should be given access to this equipment at any particular time and could proceed with the relevant items at their level while the remainder of the class proceed with other kinds of work. Indeed, it is envisaged that this equipment be stored on some kind of trolley which could be taken at the suitable times to the part of the building where the programme needs to be put into operation. Thus a remedial approach adopting this programme takes the material into the classroom as part of normal classroom activities rather than extracting children in need and dealing with them in another part of the building. This, we believe, is far more valuable.

Encouraging reading fluency

The provision of adequate material related to children's rate of progress should be an essential feature of remedial teaching. In no sphere does this apply more so than in the provision of an appropriate supply of books for practice in reading leading to fluency. Most reading schemes contain a number of graded supplementary readers which appears sufficient for the child who is developing normally. The slow-learning poor



Material stored on trolley

reader, however, so often finds himself with the same reading book for months on end and eventually, by devious means, he manages to memorize this so that he can go on to the next one which is even more difficult. This common, frustrating experience contributes to the poor standard of reading so frequently encountered in schools.

In dealing with this problem the West Bromwich Child Guidance Service has evolved a system whereby several schemes and graded series are correlated to provide a wider selection of books at any particular level. Using the Spache Readability Formula, each book is assessed for reading difficulty and classified into six monthly reading levels, each of which is given a signifying letter, e.g.

Reading age
$$5^{0}$$
 to $5^{6} = A$;
 5^{7} to $6^{0} = B$;
 6^{1} to $6^{6} = C$;
 6^{7} to $7^{0} = D$, etc.

This letter is then marked on the front cover of the book and eventually each book of the same level is put into a box which is placed with other lettered boxes in a convenient place in the room. In the meantime the children have been given a reading test (Kingston Silent Reading Comprehension and/or Graded Word Reading) and grouped into similar six month reading age levels. These too are denoted by letters. The teacher then explains that Group A can read books from box A, group B can read books from box B, etc., often starting children at a lower level than their seading age suggests so that they will acquire a good degree of confidence. In this way children have access to several titles at that level which provides them with considerable practice under the guise of progressing from one book to the other. When the teacher is satisfied that a child is coping with that level, he can go on to the next box.

This system has already been used extensively in West Bromwich schools to great profit. In addition to providing the necessary practice material, it does enable a more appropriate choice of reading books which relates reading difficulty level to interest age. Furthermore, it is possible to include books

which would not otherwise find a place in the structured reading scheme but which, nevertheless, provide that degree of enjoyment which is an essential part of reading.

References

- Schools Council Research Project in Compensatory Education. University College of Swansea Department of Education. Compensatory Education:

 An Introduction. Occasional publication no. 1.
- WITTY, P. A. (1967) The Educationally Retarded and Disadvantaged (66th Year Book of the NSSE).
- TANSLEY, A. E. (1968) Reading and Remedial Reading, Routledge & Kegan Paul.
- TANSLEY, A. E. and GULLIFORD, R. (1960) The Education of Slow Learning Children, Routledge & Kegan Paul.



16 Remedial teaching in primary schools R. S. Pope

Justification for yet another article on the subject of remedial teaching must be found on one or all of the following grounds. It must either present a new approach to the subject, or offer a well-tried approach in a different form, or else be directed to a section of readers who for various reasons have not familiarized themselves with the excellent works which are already available. The purpose of this article is strictly limited. It proposes to examine the assumptions generally made concerning the aims of remedial teaching, and then to outline approaches which are often overlooked in the conventional situation. Methods as such are not discussed, but it is hoped that the questions posed will lead to deeper thought on the part of practising teachers engaged in this vital section of primary school education.

The aims of remedial teaching

A suitable 'starter' for discussion of aims in remedial work is to be found in the following quotation from James Webster's Practical Reading: some new remedial techniques: 'An ounce of practical know-how outweighs a ton of theory. "Whys" and "Wherefores" are all very well, but at five to nine on a Monday morning what to do is the question that has to be answered."

This seems at first sight to be an eminently sensible comment. Reflection, however, leads one to add that it is the legitimate question for the Monday morning only if the preceding Saturday night and Sunday morning have been devoted to asking why do we do it?

One might observe in passing that in the field of education generally the question of what to do is more easily answered

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than why the task exists to be done in the first place. J. L. Synge's comments are apposite here: 'Knowledge and clarity of thought are reached mainly in two ways... questioning and answering. Our whole educational system is based on answering', 'Answering shuts the box, asking blows the lid off – a dangerous game, and that is why it is deprecated.'

The extreme confusion of thought in the field of remedial education is due to a lack of coherent philosophy of problems and aims, and some effort might profitably be expended in asking exactly what such a philosophy implies. Cynics would say that most remedial teachers soon achieve a philosophy of life in order to retain their sanity. Such teachers, they say, while making every effort in public to bring Johnny's reading age in line with his mental age, nevertheless secretly envisage 'hewers of wood and drawers of water' to the end of time. Thus, Johnny is consigned with resignation to be either a semi-literate woodman or a not-so-clever waterboard labourer.

This evaluation of the remedial teacher is, of course, pure cynicism, for optimism is never lacking in the rarefied air of the 'backward class'. However, as far as a philosophy is concerned, it is, for the most part, an implicit philosophy, and on the classroom level at least, it may perhaps be rather badly described as follows:

- 1. the treatment of a disease.
- 2. the waging of a war against illiteracy.
- 3. a vast 'tidying-up' operation.
- 4. a 'last-chance-to-improve' opportunity.

The treatment of a disease

The word 'remedial' may be unavoidable, but it has some unfortunate connotations. It suggests a cure for a malaise, and, seen from this angle, it sometimes consists of the following steps. First, there is the misuse, as Schonell saw it, of the intelligence test as a 'clinical thermometer of intellectual capacity'. Then, there is the installation of the remedial teacher – in the quaint phrase of Ronald Morris – 'as keeper of a cupboard full of remedies, which he dispenses individually, changing the bottle whenever the patient fails to respond'.

The waging of a war against illiteracy

A ceaseless flow of weighty reports, ponderous tomes and frightening lists of literary casualties ensures that martial zeal in the war against illiteracy is never allowed to flag. However, there seems to be a certain amount of high-flown deceit about the whole crusade's results. In the course of a year, one interviews hundreds of worried parents who are distressed that their children cannot or do not read, but who themselves can hardly be described as 'printer's fodder'. The tabloid press, 'Beanz Meanz Heinz' and 'Drinka Pinta' are often the extent of their literary interests. Children are intuitively brilliant, as tests to be devised in a hundred years' time will prove, and 'Don't do as I do but do as I say' carried no weight at all with them. In any case, in an electronic computerised society is anyone certain that reading will be of paramount importance?

Nevertheless, to dedicated souls, remedial education is a kind of horrific 'War Game'. It is a ceaseless struggle, in which the enemy is never vanquished, but, by some superior strategy known only to himself, survives every onslaught. Although compelled to retreat in some sectors, the 'other side' always manages to summon fresh reinforcements who are, by nature and environment, superbly equipped to resist to the last

ounce of their anti-learning resources.

On 'our side', the teacher, as the guardian of Culture and Society, is always employing new weapons. In his support, dedicated research scientists produce a host of delicately-designed techniques. Increasingly, 'psychological warfare' is gainfully employed. Strangely, the experts counsel against any 'deterrent' which, they say, leads only to 'fall-out'.

Meanwhile, the cost of the war constantly mounts. Greater efforts are demanded. However, the escalation of the conflict

by both sides is envisaged.

A vast tidying-up operation

By the very nature of their academic training and daily occupation, pedagogues are anxious to 'tidy-up' apparent discrepancies between levels of ability and attainment. While careless Nature sprawls itself in a vast diversity of colourfully unique specimens of immature humanity, the teacher often attempts

to squeeze his charges into a kind of common mould. One tends to agree with David Morris when he says that 'backwardness was first discovered when mankind developed learning'. Historically, thereafter, prevalent attitudes have oscillated between, and on the whole progressed from, ridicule, ostracism and isolation, and, latterly, integration.

Unfortunately, integration is sometimes confused with uniformity, which is another name for tidiness, and this in turn is equated with improvement. The almost universal drive for betterment is sometimes canalized at the classroom level into a 'levelling-up' process which may perhaps degenerate into the confirmation of mediocrity. It is not 'streaming' which is the epitome of 'tidiness' in education, but rather 'the educa-

tion of the average child'.

Collins (1961) repeats the penetrating comment of Lovell and Smith that 'backwardness' is a phrase used only in connection with basic subjects. In other fields, the pupil is said to be 'clumsy' (as in physical education), or 'inartistic' (in arts and crafts). The reason, it is suggested, is that these subjects are not so important for living purposes. Also, it is claimed, this idea is a vestige of the moralizing and utilitarian attitudes to education. The three R's are said to have a further important result, namely they inhibit creative, bright, 'different' children and mould them to a measurable level of mediocrity. This is, of course, 'strong meat', and if wholly accepted might end not only remedial work but primary education as we know it today.

A last-chance-to-improve opportunity

Working amongst retarded and slow-learning children exerts a humbling effect upon many teachers. On leaving school many 'categorized' children soon display a social ease and in some cases a real panache. Slow learners often pass their drivingtest at the first attempt, to the chagrin of their former teachers, and later some boast of 'A' levels even in academic subjects. The mystifying but undeniable truth is that in many instances school estimates of social value and efficiency are later proved to be wide of the mark.

That there is a vast reading problem is an incontrovertible

fact. Dr Joyce Morris's (1967) report of reading standards and progress makes it clear that there is a critical period for acquiring reading proficiency. When once this point has been missed in the primary school, all further efforts to repair the loss are scarcely likely to be completely successful. To quote Webster-(1965) again:

A high proportion of children will continue to experience difficulty with learning to read - over 40 per cent. Of these, about half will manage to overcome their troubles, but some 20 per cent will remain backward readers, retarded readers, or, in the case of about two in every three hundred, illiterate. 20 per cent of the population of this country is a lot of people.

Nevertheless, even in the face of such sobering reflections, it is still true that a lot of remedial work is considered to be a neurotic panic measure. To 'cure', in a few months or even years, a condition brought into being by a combination of social, emotional, physical and intellectual factors is a very exacting task, and all too often the condition is exacerbated rather than relieved.

Approaches to the problem

In the face of this severe debunking of the popular conception of the aims of remedial work, it might be asked whether there is any real point in maintaining such provisions. With a few important qualifications, the answer is that there is.

However, before one begins to outline what remedial education should entail, it is important to make it quite clear that remedial work is not to be confused with any of the

following:

(a) 'Normal' work with children of low average or borderline

ESN intellectual ability.

(b) 'Crash programmes' of drill and practice in basic skills with children who have missed certain educational processes.

(c) A rigid scheme designed to raise the attainment levels of groups of children, so that their attainment ages approximate to their mental ages.

Rather, remedial teaching is to be interpreted as assistance rendered by extremely skilful teachers. This assistance is designed to diagnose causes of failure and to give 'to the child the means of developing his unrealized intellectual powers so as to achieve satisfying standards in the basic subjects'. This latter phrase is borrowed from Dr J. E. Collins, whose Effects of Remedial Education (1961) is perhaps best described as the Bible of Remedial Revisionists.

Diagnosis is most important if remedial work of any kind is to be effective. It is also most likely to be misunderstood

and misapplied.

It is fair to say that most existing methods used in remedial education may be described as 'drill', in that they are aimed at training the senses, chiefly the eye, ear and touch. Failure in reading and spelling is usually diagnosed as due to a specific weakness in auditory or visual perception. Gates's tests, however, show that this conception may be erroneous, for the real weaknesses are omissions of words or letters, and a weakness in the speed of oral reading. Omissions show poor vocabulary and thinking-power (Vernon, 1951), and that it is impossible to 'divide oral reading into speed versus accuracy factors'. Tests apparently test conceptual rather than perceptual factors. Remedial work is thus usually concerned with remedying symptoms rather than treating (or accepting) poor vocabulary and development. Investigations have warned against acceptance of such a facile treatment. Malmquist (1958) has posed a large question-mark against 'word-blindness', while Schonell, as far back as 1948, had said, 'research shows that it is fatal to "push" young children, along in their initial stages of learning to read, particularly if there have not been activities to create a functional language background before-

In spelling, remedial work is also often in the form of drill. hand'. Schonell, in 1942, devised his word-drill, related to diagnosed differences in visual and auditory perception. In his casestudies of types of spellers, Schonell suggested that symptoms related to personality, environment and teaching-factors were all interlinked. Remedial methods devised on sight-drills and 145 phonic-drills were seen, however, to influence in some way the relative emphasis placed by the pupils on visual or auditory reproduction in their spelling. Techniques were thus being taught before children were ready to make use of them. In remedial arithmetic, assistance is often based on the formation of bonds, habits and automatic responses. The bonds are identified, formed or broken, errors are diagnosed, and the correct reaction is rewarded by success and praise. The resultant mechanical proficiency thus acquired often leads to tasks being set before either readiness or meaning are seen, as the advent of New Mathematics has so convincingly demonstrated. If 'drill' in mechanical arithmetic has been so effectively challenged, is it not probable in the same way that 'drill' in mechanical reading will be just as fiercely attacked? Just as in mathematics, where relationships, meanings and real understanding by experimentation are now seen to be vital factors, so in reading, a real experience of vocabulary is essential. 'Slow learners', even more than 'bright' children, need time to move and find out for themselves. It is interesting to note in this connection that even such an 'orthodox' investigator as Schonell expected 15 per cent of eight-yearold children to 'lag' because of immaturity.

As opposed to all this, the stress upon symptoms, their diagnosis and eradication, looks for certain 'specific' factors, e.g. 'word-blindness', 'left-handedness', 'congenital disability', 'auditory and visual memory-span'. These are, of course, symptoms of a condition rather than causes, and they fail to take into account such factors as personality-differences, stages of development, motivation, and educational environment.

A great deal of this misdirected attack upon the symptoms of retardation stems from a false form of diagnosis. Skilful diagnosis is essential, but it must be a diagnosis based upon a study of the child as a whole, and in this study, assessment of maturity is most vital. The popular conception of a child working at, below, or above his or her mental age must instead be replaced by an index of maturity. Collins has suggested that the following features be considered together.

- 1. Physique: height-weight; age plus medical history.
- 2. Speech-development and vocabulary.

- Mental age on WISC (Wechsler Intelligence Scale for Children).
- 4. Achievement age: arithmetic and reading attainment.
- Motor co-ordination tested by Goodenough 'Draw-a-Man' test.
- 6. Social age: Vineland Social Maturity Scale.
- 7. Emotional age: play and friendship choices.

The above concept of differentiated readiness would replace the theory of mental readiness which leans too heavily upon an accepted mental age. Instead of an intelligence quotient, there would be an 'organismic-quotient' or kind of 'picture-indepth' of the child as a whole. Such an idea of differentiated readiness accords closely with modern theories of child development. Equally obvious is the fact that it makes far greater demands upon the abilities of the remedial teacher. Both diagnosis and treatment are vitally affected, for it would imply the provisional acceptance of an untidy pattern of achievement and development, and the neurotic 'last chance' philosophy would be removed.

Diagnosis of individual reading difficulties

Dr Joyce Morris (1967) remarks that in quite a number of schools used in her survey of reading standards: 'it was generally believed that time given to testing could be spent more profitably in teaching'. In a footnote to this remark it is further pointed out that 'the current shortage of educational psychologists in the country as a whole suggests that, except for the most difficult cases, the diagnosis of individual reading difficulties and their treatment remains the responsibility of teachers'. (This is patently true, and one must further add that more and more experienced and specially trained teachers are coming into the schools from supplementary courses, and authorities are making greater use of their expertise.)

Even if Collins's Differentiated Readiness Assessment listed above cannot be fully implemented in every case, it is essential that all the cases of slow-learners should be individually considered in some depth. In the first place, there will be those children who have specific disabilities. It is alarming to note in this connection that many children referred for

investigation have defects of eyesight, hearing and manual co-ordination. Time after time, there is evidence of minimal cerebral dysfunction, a history of otitis media (middle ear infection), glasses prescribed but broken and not replaced. 'Too little and too late' is often true in these cases, for while the conditions are often correctly diagnosed and alleviated the 'critical time' for remedial measures has often passed, and when appropriate measures are finally initiated the situation is not wholly remediable. A practical suggestion is that all children who have learning difficulties at the age of seven years should be referred for specific examination, first by the school medical officer and then by the educational psychologist.

The second class of slow-learners who are fairly easy to distinguish are those whose school records show either that they have missed long periods of school, or are sporadically absent, or have changed schools quite frequently. These problem conditions, so powerful in retarding progress, are often accentuated by home difficulties, such as domestic strife, or parental neglect or even cruelty, and by a complete intellectual vacuum after school

Not so easy to identify at an early stage are those who remain immature, and who if 'pushed' will only retire slowly but surely into a hard impervious shell of non-reception of all instruction. Significant pointers, however, are substandard physique, speech difficulties, low attainments in basic subjects, clumsiness, and difficulties in their relationship with other children and adults.

With regard to physical characteristics, Tanner (1961) has proved most convincingly that one must expect quite considerable individual differences in the rate of physical and from his main conclusions: 'Skeletal age is associated . . . not age', and 'certainly with advancement in mental ties.' A fast-maturing child has 'greater chance of passing same chronological age'. Tanner suggests that:

(a) Some allowance must be made because of developmental age, and that:

- (b) opportunities must be given for children to 'catch up'. 'If the usual bus has left by the time he arrives, others should be following after.'
- (c) Maturation is a vital factor. There is a perfectly valid sequence of critical stages for maturity development, and if 'critical stages' are missed or anticipated then optimal cell assemblies are prevented. When a motor activity, such as, for instance, muscular coordination of the eyes so vital in reading practice is mastered but not used, there is a resultant lowered efficiency later.
- (d) It is possible to replace the outmoded idea of 'learning readiness' by a substitution of learning-readiness plus maturity of cell-assemblies. This is described by Tanner as 'a readiness for concepts'.

All this makes great demands upon remedial teachers, and it presupposes a high degree of skill and expertise. The teacher becomes, in a special sense, a 'watcher of signs and portents' (Bowley calls him a 'wise detective'). Carefully kept records of every aspect of a child's development are essential and a close liaison with expert medical, social and psychological assistance is vital.

Lastly, there is the category of children whose performance is adversely affected by emotional disturbance. Aggression, withdrawal, nervous habits or tics, lack of acceptance by peers. all these symptoms are fairly obvious to the experienced teacher, but not so easily noticed are those children who have 'hidden' fears, temporary dislikes of school and teachers, failures in some subjects, or dislike of games. All these intricate webs of minor and major emotional difficulties are, of course, the sphere of psychological investigation. A practical word of advice is apposite here. Somewhere on the staff there may be one who has an intimate knowledge of families in the area, and is aware of traits and eccentricities. Such information is often invaluable, if not for remedying a situation, then at least for producing a tolerating acceptance of 'failure'. It is this last category of children whose condition is best diagnosed and treated by the educational psychologist, who by training and experience is best equipped to evaluate the degree of disturbance and to prescribe what action is to be taken. Ideally,

the educational psychologist is the head of the remedial hierarchy, and is served by an assistant and a number of remedial teachers, some located in the child guidance centre or remedial centre, others employed in a flexible scheme which incorporates peripatetic work involving school and home visits. This team will be completed by the presence of the social worker. If in any particular school the number of children requiring assistance is sufficient, a remedial class might be set up. Otherwise frequent visits will be made by a peripatetic teacher.

The importance of obtaining a 'picture in depth' of the problem has already been stressed, and no such picture is complete without taking into account domestic circumstances. Douglas's comments have already received widespread approbation, and in remedial education an understanding of social factors is vital. A century of compulsory education for all children has created the impression that school is a naturalistic society, whereas history suggests that it is the family which is the natural unit and that school is an artificial structure. The recognition of this fact will lead to a most important new development in remedial work.

By a new development one means the bringing of parents into the remedial situation to a far greater extent than hitherto. In theory the idea has been accepted from the commencement, but one searches in vain in most of the manuals of remedial work for signs of its implementation.

Dr Stott in Roads to Literacy (1964) has a brief paragraph on this subject at the conclusion of the section dealing with the Bristol 'Experiment in Remedial Teaching'. 'Owing to the fullness of the programme, the three tutors could devote very how much greater an understanding a teacher thereby gains of a child.' Furthermore there are references to 'convincing the child's attitude to the teacher', 'a striking change in positive help'. The same idea has been developed by Keith results.

This highly useful adjunct to remedial work has been in

operation in the Swansea Education Authority for the past ten years, and parental cooperation is considered to be one of the main prerequisites for successful work in this field.

In the ordinary course of school life it is difficult to find time for this 'gossip of retardation' in the head teacher's over-occupied schedule of work. Also, there is hardly any need for the procedure in the case of children who are coping quite well in school. Furthermore, it is a technique which demands skill and experience similar in some ways to the task of the social worker, but directed to a rather different end. As it is mostly mothers who will normally attend to discuss their children's lack of progress, it is a very good plan to request the male parent to attend as well.

The initial interview is further implemented and reinforced by periodic reviews and consultations. Progress, and the lack of progress, must be discussed quite frankly, and even when the child is not 'moving' in any way, analysis is appropriate. Parental interviewing emphasizes the point that even 'perfectly normal' children have not come off some sublime assembly-line as 'standard models'. An understanding, patient interviewer will be given, amidst a host of apparent irrelevancies, vital pieces in the jigsaw of retardation: a family history of reading difficulties, perhaps; a difficult birth; epilepsy in a near relative; domestic unhappiness; enuresis; teacher 'pashes'; unexpected abilities; unrecorded changes of home and school: all these are among the more common items of information provided.

As in an ordinary family children are treated equally and yet differently, so the same principle applies in remedial work. Children are never segregated, but, on the other hand, it must be realized that some children respond better when they imagine that they are receiving 'extra attention'. Again, if visits are made to a remedial centre, some children will want to be grouped in homogeneous 'sets' where they have friends. Others are individualistic (as opposed to being 'isolates'). The flexible approach includes not only the availability of different methods, but, more important still, the provision of different teachers, both male and female, for the human relationship is

vital.

The fact that teaching methods have been omitted from this article does not indicate that they are regarded as unimportant. Nevertheless 'skill is born of delight'. Motivation, atmosphere, skilled diagnosis, insight, understanding, flexibility, these are the first essentials.

Maybe the love of reading, like most of the higher skills in life, 'is better caught than taught'.

References

- COLLINS, J. E. (1961) The Effects of Remedial Education, University of Birmingham Institute of Education.
- DOUGLAS, J. W. B. (1964) The Home and the School, MacGibbon & Kee. Gibbon & Kee.
- GARDNER, KEITH Towards Literacy, Blackwell.
- MALMQUIST, E. (1958) Factors Related to Reading Disabilities in the first grade of Elementary School.
- MORRIS, JOYCE M. (1967) Standards and Progress in Reading, NFER. MORRIS, R. (1963) Success and Failure in Learning to Read, Oldbourne Press.
- SCHONELL, F. J. (1954) The Psychology and Teaching of Reading, Oliver
- STOTT, D. H. (1964) Roads to Literacy, Glasgow, Holmes.
- STOTT, D. H. (1966) Troublesome Children, Tavistock Publications.
- TANNER, J. M. (1961) Education and Physical Growth, University of London Press.
- WEBSTER, J. (1965) Practical Reading: some new remedial techniques,

Remedial education in secondary schools

Arrangements for 'secondary' education in Britain cannot be explained briefly, if at all! LEAs which have adopted the so-called Leicestershire plan use first schools, middle schools and various kinds of tertiary provision – secondary education appears to have disappeared altogether. However, most LEAs continue to redeploy children at the age of eleven years, and the most standard form of comprehensive school takes pupils from eleven to eighteen years. The great bulk of children attend some form of non-selective secondary educational establishment, and Section VI is concerned with those whose attainments place them in the bottom 20–30 per cent of such schools.

Smedley (17, p.154) has made a valiant attempt at depicting the complexity of secondary education and criticizes remedial teachers for failing 'to look painful, contradictory situations squarely in the face'. It may appear that way, but Adams had raised many of these points in 1971 and the journal recently printed an article entitled 'Remedial education is a hoax'. Confused we may be, but not disingenuous, not cowardly, not stubbornly perseverating in demonstrable error. Williams (19, p.170) scrapped his successful remedial department because he feared the social consequences of segregation. The other accounts of departmental arrangements reveal skill and good management techniques; and many others have been printed (especially in the symposium issue in 9.1, 1974).

It is not a happy state of affairs that Swan (21, p.184) has to set out a guide for teaching reading to young adults; but it is necessary and he has done it admirably. Older pupils stay away enthusiastically: is this the reason they do not learn, or do they stay away because they have failed to learn?

17 Organization of remedial education in the secondary school

Brian Smedley

Do what you will, the world's a fiction And is made up of contradiction.

William Blake

It has been stated that a school is a people processing establishment (Brimo and Wheeler 1966). Nor is this activity carried on in a way divorced from all other social undertakings. Since at least the time of Hegel there has been a growing awareness in Western culture that human activity is better represented as a closely interlocking jigsaw than a fortuitously proximate mosaic. This is especially true of those institutions which are instrumental to the continuance of society and are the means whereby socialization is brought about. Schools are such structures. In their objectives they reflect the value systems of the encompassing society – 'The ideology of teaching is an aspect of wider politics – religious ideologies' (Swift, 1969, p.58).

This state of affairs is especially problematic in a society such as ours. The division of labour has produced huge populations with wide technical diversity within them. Geographical and social mobility have increased. Historical awareness has widened and deepened. These are some of the factors that have resulted in a range of diverse and often conflicting Weltanschauung. Already implicit in the awareness of social diversity among the commercial Greeks, this tendency became more evident in the Renaissance ('there's nothing either good or bad but thinking makes it so'), and rampant in the nineteenth century. The pained bewilderment of Ruskin, Tennyson and Arnold reveal this. Browning, in spite of a robust optimism, acknowledged it: 'ten men love

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that which I hate, shun what I follow, slight what I receive'. Cracks in the ideological unity became total breakages at the time of the first widespread mechanized European wars. Experiences could not be assimilated coherently in terms of the whole of the existing schemata.

And this must show in our education. Always torn between the production of a Platonic elite or Christian souls equal in God's right, the objectives of educators became even more capable of attack from other points of view or ambivalent in terms of internal conflicts. This is no mere semantic consideration. A modern philosopher has noted:

The deployment of such concepts is intimately bound up with an entire set of institutions, and the proposal to remove them or try to get rid of their evaluative force is not a proposal for a kind of logical reform about what words we use to describe the world, nor, merely, how we commend what is there, but a proposal to change our entire view of our social relations (Williams, 1973, p.195).

Additionally, and wisely, Williams notes that, unlike the conflicts of logical discussion, these differences may admit of no solution – nor need internal consistency be a prerequisite of their 'satisfactory' statement. He remarks: 'I think it was Strawson who once suggested that morality was the field in which there could be incompatible truths; and in fact this is honoured in much literature, though not in much moral philosophy. The notion of tragedy is some part of this idea' and he goes on to mention 'the existence of genuine and deep and, it may be, at the end of the line, irresoluble conflict' (*ibid*, pp.204–5).

The administrative, and hence politico-moral, commitment to the school as one of the chief instruments of socialisation may, itself, represent a dichotomy of this kind. Illich (1973, p.164) has written: 'obligatory schooling inevitably polarizes a society'. He has described schools as 'the wrong place for learning' and 'an even worse place for getting an education' (p.167). Rather than a unifying cement school education is a splintering blow. Illich writes: 'The power of school thus to

divide social reality has no boundaries' (p.168).

If these considerations are true of education in general, they are even more relevant to remedial education in particular. Conflicting, diverse, vague and ambivalent objectives, reflecting the social situation, must affect all children but especially those whose principal categorization is that they have failed to meet certain expectations, however ill-defined these have been. Perhaps 'comprehensive schooling' has not improved their lot. An unkind critic could observe that its architects are in direct line from the builders of the Tower of Babel and its policy makers have played God's role in the proceedings and introduced the confusion of tongues.

Eysenck (1971), perhaps with great fairness, has stated an aspect of the conflict in structuring remedial education in terms of 'countervailing values' and 'dilemmas of action'. He contrasts in values the beliefs in 'equality of opportunity and structural integration' against those which express 'concern for individual differences'. The former belief will entail heterogeneous grouping and the belief that 'children should be given equal access to knowledge and that there should be structured integration of minority children'. The latter view will mean that homogeneous grouping by ability and/or achievement levels will prevail and that 'each child should be grouped with those similar to his own grade level performance so that instruction can be geared to his ability and performance level'. On the one hand, this will result in 'one teacher handling wide disparities in academic performance' and on the other the fact of 'ceilings on expectations setting in motion a self fulfilling prophecy' (Eysenck, 1971, p.134).

As with all classification this could be disputed. Some of the opposites may not be intrinsically diverse but only contingently so - in terms of this particular schema. However it does seem possible that one of these irreconcilable differences, postulated by Williams may be somewhere in this direction. 'Deviant' children in large groups may be neglected. Children in small 'remedial' groups may be 'written off' in comparative terms at least. Rosenthal's work has shown how insidious the effects of such classification can be. Here is one of the basic problems of structuring remedial education. Cleugh,

one of the pioneers in the field, has made this point. A special grouping, she notes, 'has the merit of integrating the work and handling of the children, but at the cost of splitting off from the rest of the school' (Cleugh, 1959, p.135). The problem is still with us. It reflects, no doubt, an ambivalence in our society, an uneasy coexistence of values. We applaud success and superiority. We deplore failure and abasement. Conjointly we sometimes speak of men as brothers, Christianity and Stoicism, which Gilbert Murray claims the gentry of classical times learnt from their servants, conflict with aristocratic belief in superiority and leadership. Remedial education must show this conflict in its basic objectives and settings. As late as 1959 Cleugh found the naive confusion of the Headmaster who claimed 'There are no backward children in my school' and the contemptuously superior teacher who exclaimed 'Backward class? Not likely!' (Cleugh, 1959, p.86).

The dilemma in objectives, clearly defined by Eysenck, can be seen at the level of practical detail in Cleugh's comments on the 'special class'. The relative freedom of the teacher from a restricting syllabus, the opportunity to 'really know' children and scale work to their seeming interests and abilities are noted. The elaborate jigsaw of specialization can be avoided and the teacher can integrate the child's studies. As Eysenck (1971, p.154) noted, 'instruction can be geared to his ability and performance level'. Against this, however, must be set the whole question of stigma and the problem of labelling. Cleugh (1959, p.117) mentions a special class teacher who was asked (as surely many of us must have been) 'why they did not have so-and-so like the others'. She goes on to note that it is easy to talk 'pious nonsense' about this kind of problem. Moreover she notes the expectations implicit are often situation specific and writes 'to remain four years in the one class is not a drawback in a small village school where everybody does it, but it can be a big drawback to social acceptance in a town Secondary School, where the usual promotion pattern is quite otherwise' (p.117). Few can, perhaps, read Cleugh's books without sensing her attempts at thoroughness and dedication. Yet, twenty years ago, the basic conflict in society's values and its possible effect on these children, likely to be

thought in need of 'remedial education' caused such a woman something near despair. She has recorded her opinion that 'It may very well be that conditions are too intractable and the problem insoluble: if so, then to salvage what one can is intelligible' (1959, p.138). This is brave but sad.

More recently the Department of Education and Science has investigated the problem of (remedial education' at 'secondary level' (DES, 1971). They attempt to solve the dilemma, squarely faced by Cleugh in euphemistic terms, and speak of the 'slow learner'. This is badly stated in the text as equivalent to 'dull', 'retarded', 'educationally subnormal', as well as 'children whose learning is slowed down by one or more factors of which limited ability may be one'. Where the definition is specific it carries the old stigma. Where this is less evident, the definition is vague. Possible physical causes are delineated specifically, but it is easy in our society to recognize and accept these. The role of 'invalid' is defined and usually it is sympathetically treated. Vagueness exists regarding the behavioural deviations. Williams (1973, p.195) has noted that 'with assessments of human character: the thing which given societies find it fit to pick out as characteristics of human beings, to praise, condemn, remark and so on, are tied up with the kind of expectations they have of human beings'. Remedial education is bedevilled by ambivalence in society at the level of objectives and embarrassed vagueness in the area of diagnostic models. This question of 'models' is implicit in the remark 'Official record cards can be very uninformative; numerical assessments of intelligence give no indication of learning difficulties' (p.5).

These problems must cause confusion at the structural and uncertainty at the specifically technical levels. Thus it was found that 'Some schools were "streamed" and changing to "unstreaming": elsewhere, unstreamed schools were reverting to streaming with virtually every intermediate kind of arrangement' (DES, 1971, p.1). The inspector's comment 'It would be difficult to describe briefly the diversity of organization academic as well as social - in the schools visited' (p.7). This variety of structure appears to be an attempt to solve the incompatibles mentioned by Eysenck and Cleugh. Most schools felt compelled to organize their pupils in streams according to ability. Within this differences were considerable. Some had unstreamed classes for younger but streamed classes for older children. Others used 'broad banded' parallel streams and still others, 'sets'. One-third of the schools had a 'Remedial Department' but such was the bewildering (perhaps evasive) approach to the problem that, 'in a few cases it was difficult to establish whether a Remedial Department actually existed'. It was considered doubtful whether those schools which attempted to avoid 'low ceilings' on attainment through labelling, really succeeded in their objectives. Attempts made to withdraw children for remedial instruction in a way less likely to draw attention were considered possibly ineffective. Above all, such work could only be carried out at the expense of other aspects of the curriculum. Cleugh's problem had returned. Children recognize that they are missing out. The inspectors commented 'To the disruption of the rest of their work is added the feeling of loss of status' (ibid, p.9). 'Plus ça change . . .'

The divergences in objectives can be seen in the attitudes of teachers and their status recognition. The report quotes a Head who stated 'Teachers on the staff prefer to teach their specialist subjects to examination level, where success is more readily apparent and even more readily acclaimed' (p.14). It is further noted that where remedial departments do exist the financial recognition indicates that heads of department 'rank in status well below that of the academic departments' (p.12). The result is very much what might be expected: 'a vicious circle is apparent – staff without specialist training, and very often little experience, poor facilities and unimpressive results, which in turn deter better equipped teachers from undertaking this type of work' (p.12). Not surprisingly comment is made on 'the unimpressive work seen' (p.13).

Whatever influences bring a child into a remedial situation, it is evident that at least some of them must exist outside the school. This points to liaison with outside services. Again the situation is a disappointing one. People seem to be uncertain as to which services can supply relevant help (a consequence of

inadequate 'models'?) As is so often the case, resources outrun demand (a consequence of ambivalent commitment at the level of objectives?).

The report remarks on all this that 'uncertainty of aims, objectives and methods for the "slow-learner" was immediately apparent in many – indeed the majority of the schools visited (p.16). It is further stated of the 'remedial' child that 'the uncertainties are obvious – uncertainty about the nature of their potential, about the nature and extent of their disabilities, about the most appropriate organization, about suitable educational methods and techniques, about the nature of a suitable curriculum' (p.21). Alas! the only approach to truly humane treatment seems to have been gained at the expense of realism. The report writers mention the school as one where a 'profound and sympathetic respect for the worth of each individual child appeared to be associated with a total disregard – indeed a total unawareness – of individual limitations' (p.20).

The general impression of a 'confused' area in education is also maintained by Brennan (1971, pp.8-9). He writes of 'some remedial teachers' who 'just do not know to whom they are responsible'; he concludes that 'the backward child who does not enter a special school is left in the most hazardous situation in the whole of the education system'. Brennan sees the need, and few would dispute with him, for the 'quality of all provision' to 'be lifted to at least the level of the existing best'. His analysis of why this has not been achieved and of how it should be attempted is perhaps simplistic. He sees the 'root cause' as the 'movement of experienced staff' because of the 'lack of any clear career structure offering reasonable prospects of professional advancement to teachers in remedial education'. He proposes a hierarchic structure along fairly conventional lines. All teachers involved in the work should have an extra allowance. There should be a series of levels of pay which rewards those having responsibility for supervising the work of others more than for those actually carrying out the work. And at the top of the pyramid is the usual adviser/ inspector. He is to be 'an expert in the education of children with learning difficulties for these disabilities extend over all categories of handicapped children'. If such a person could exist the extent of his erudition would be more than a little impressive! One assumes 'expert' is used widely.

In proposing this social structure for teachers, Brennan shows his basic belief in a Platonic elite (on the lines of the Guardian in the Republic. The only difference being the inverse correlate between status, power and economic level) rather than in the equal brotherhood of man. He has opted for a given social order. It is unlikely that 'remedial' children will be unaware of the interaction involved in this situation. They will be conscious of nuances in adult/adult interaction and will not fail to apply the moral to themselves. Brennan has opted for one type of social structure, and it is a kind that is one source of ambivalence in the objectives of education in general and remedial education in particular.

Sometimes there is a tendency to interpret remedial education in the narrowly specific sense of additional, more intensive and, sometimes, more specifically appropriate instruction in the basic subjects, especially reading. Literacy has long been evaluated in our culture. The Egyptian priest could record past events and thus impressively predict future ones where a recorded, regular cycle enabled this. The medieval warrior may have despised the scribe but was compelled to depend on him. Literacy was one of the chief objectives of the nineteenth century proletariat and is of the peasantry in contemporary British and South American societies. Social status surrounds reading and writing. McLuhan has questioned how long this state of affairs will continue but in the meantime even the most 'feckless' parents are usually worried about their child's capacity to read and write. To the teacher this is an advantage. It seems possible to avoid larger issues of conflicting values and to be snugly ensconced in an area where technical expertise can be built up and conflict avoided.

A survey by Olive Sampson (1969) shows that this is something of an escapist 'pipe-dream'. The same reluctance to look painful, contradictory situations squarely in the face, that can be seen in remedial education when widely interpreted,

exists here. A self-deceiving avoidance of complexity can exist. There is a tendency to look for a cast-iron certainty. Sampson writes, for example, that 'diagnostic techniques are by no means as foolproof as some apparently imagine' (p.62). Additionally she notes, of teachers who considered themselves to be following individual methods, that 'the teachers' identification of preferred books and materials frequently suggests doubts as to the individual character of their methods'.

Differences in technical approach existed. Some aimed at producing a new attitude on the part of the pupil. Others felt a need for a material that must have pupil-appeal. Many saw their problem in terms of techniques but these were divided on preference for 'phonic', 'look-say', 'sentence' and 'mixed' methods – or the use of i.t.a. Not surprisingly in response to the question, 'is there any trend in remedial education that you consider particularly worthwhile?' the teachers' answers were such that 'no clear pattern of opinion emerged' (Sampson, 1969, p.63). Behind these tendencies to interpret remedial education in terms of the basic subjects, there is always the possibility that an oblique approach would be the one most likely to produce results, that success and interests in other areas would give point to the acquisition of these skills.

The organization of remedial education in secondary schools brings into question certain problems and these are not easy of resolution. Above and before all else is the basic question of objectives. Our society is ambivalent in regard to its treatment of those who are less successful - in terms of conventional social and educational aims. The commitment to assist is only partial and this is reflected in the economic status awarded to those teachers who attempt to work in the field and the resources provided for their use. An alteration at this level can only result from a true change in society. This will not be easy. Samuel Butler imagined, in Erewhon, a society where the physically sick were regarded as we see the morally deviant and the latter were sympathetically considered as being 'ill'. A social 'about-turn' of comparable totality will be needed before the basic dichotomy within which the remedial teacher must try and work can be removed. Because of fragmentation in social attitude, the division is not even a

clear cut one. Confused ambivalence is perhaps even more harmful as a source for policy than coherent, clearly defined and open conflict. The confusion as to appropriate models of human nature would be less likely to arise. Perhaps all known societies have approved some activities and rejected others. Perhaps all known societies have regarded some achievements as superior to others. Social conditions such as those that prevail today are vague, contradictory and wavering on both these matters. Conflicts that may not admit of resolution could be involved. And somewhere in this unhappy, dissident state of affairs will be the efforts to organize remedial education. If solution there be, its discovery will demand clarity of thought, its implementation, conviction of action and its honest foundation a recognition of apparently irreconcilable attitudes.

References

BRENNAN, W. K. (1971) A Policy for Remedial Education, Joint Council for the Education of Handicapped Children, Didsbury.

BRIMO, M. and WHEELER, S. (1966) Socialisation after Childhood,

CLEUGH, M. F. (1959) The Slow Learner, Methuen. Wiley.

DEPARTMENT OF EDUCATION AND SCIENCE (1971) Slow

Learner in Secondary Schools, HMSO.

EYSENCK, H. J. (1971) Race, Intelligence and Education, Temple Smith. ILLICH, I., in J. Raynor and J. Harden, eds (1973) Equality and City Schools, Routledge & Kegan Paul.

SAMPSON, O. (1969) Remedial Education Services, Remedial Education,

SWIFT, D. F. (1969) The Sociology of Education, Routledge & Kegan Paul. WILLIAMS, B., in B. Magee (1973) Modern British Philosophy, St Albans, Paladin.

Westfield School, Mosborough, Sheffield: 18 The slow learner department

Sylvia Blackburn

Selection

Westfield School is a fully comprehensive school of some 1800 pupils and over 100 full and part-time teaching staff. When children enter the school at the age of eleven, the school has already received reports from the head teachers of their primary or middle school. These reports include gradings in basic subjects. There are no examination results of any sort. Each year approximately 350 children are admitted in the first year. Using these written reports and information obtained from the primary or middle school heads personally by the assistant head (woman), these children are sorted out as follows:

4 forms 125 pupils Above average academic ability

4 forms 185 pupils Average and below average ability

2 forms 40 pupils Slow learner department

The two slow learner groups which are limited to twenty in each group are generally the first to be sorted out and they are

given very deep and careful consideration.

Numerous factors have to be taken into consideration including intelligence and attainment in basic subjects. Sometimes environmental factors, physical handicaps, and emotional instabilities may be necessary factors to warrant the inclusion of the child in this section. Altogether about sixtyfive children are considered for places in this section. When the children actually enter the school in September they are tested by the department and two groups of twenty are constituted, the other twenty-five making up the sixth form of the middle band. Thus the department is responsible for 120 pupils throughout the first three years, but a careful eye is kept on the other eighty or so children who were not put into the department but were considered.

With a little further selection in the upper and middle ability bands during the second year, this organization operates for the first three years in the school. During the third year all children and their parents are consulted about the courses available during the fourth and fifth years. Most of the academically able children enter an examination course leading to the GCE in most subjects, while those children in the middle band work for the CSE examination in most subjects with perhaps an odd subject(s) in GCE. All the children in the slow learner department together with some of the less able children from the middle band enter a general course of study in which provision is made for a limited number of subjects to be available for examination work. Where it is felt that a child may benefit from examination work in a subject he or she may take this subject in the CSE examination. During their time with us a number of children transfer (at various stages) from the slow learner department to examination courses. In the past some have done very well indeed.

Teaching organization

At Westfield a forty period week is taught. For the first three years this is broken down for slow learner children as follows: Art History 8 English 2

Music 3 Geography 6 Mathematics Woodwk./ Physical Religious

Dom. Science 2 2 Science 2 Education Metalwk./ Biol. Science Physical Needlework 2

Education In the fourth and fifth years English and mathematics are taught in withdrawal groups. A blocked timetable operates during these years so that long periods of time may be given to craft work, music, drama, physical education and outdoor pursuits, careers, community service, leisure pursuits, religious education and the other usual subjects in an academic programme. Considerable emphasis is placed during the fourth and fifth years on sound social adjustment and the development of good personal qualities. Each student acquires his or her own record of personal achievement during this period. We hope that students will gain in confidence and maturity during these two years by responding to the advice and guidance of departmental staff and their own personal advisers.

Staffing

The department is staffed by the head of department and four assistant masters or mistresses. Between them they teach 170 periods for the slow learner department, i.e. all the English, history, geography, mathematics and art during the first three years; withdrawal groups in English and mathematics, careers, community service and leisure pursuits during the fourth and fifth years.

As far as possible and definitely in the lower of the two groups in each year, the English, history, geography and mathematics for each group are taught by the same teacher. Block timetabling is the practice so that rigid adherence to the subject the timetable specifies is not essential. The allocation of time to each subject or combination of subjects is the task of the teacher concerned. The children, being individually different in their rates of learning and progress, require individual treatment for the most part and therefore formal classroom teaching is at a minimum.

The head of department sees all the children in the department during the course of a week by teaching art and craft to all six forms as well as some English and mathematics to the withdrawal groups in the fourth and fifth years. The practical subjects, physical education, music, and religious education are taught by carefully chosen members of the specialist departments involved (as far as possible staff who are sympathetic to the needs of these children are responsible).

What the department tries to do and the methods employed

Aims

Briefly it aims to ensure that when the children leave school they should be occupationally, personally and socially adequate.

1. Occupationally they should be able to support themselves from work suited to their ability. They should be alert, cooperative, able to use their ability to the full and achieve satisfaction at their own level. They must be punctual, reliable and honest, able to work without supervision and

- safely. They must take a pride in their appearance, be able to mix with fellow employees and know how to treat their seniors correctly. They must have a little background knowledge of industry and commerce.
- 2. Personally they should be able to care for their personal hygiene, comfort and safety and to join in the social life of a community. An elementary knowledge of how their bodies work is also useful. They should be able to organize themselves with regard to money matters.
- 3. Socially they should be able to mix with people, and know and accept social standards, the courtesies of life and the responsibilities of adult life. Above all, when they leave school, they should have gained their own self-respect through a feeling of security, adequacy and achievement. Failure to do this will only lead to unwholesome behaviour patterns and characteristics before or after they enter the world outside the confines of the school.

Methods of teaching in the slow learner department

Teaching in the department, therefore, in the basic subjects is largely geared to these ends. The content of the subject matter of the lessons must have an obvious and immediate meaning for the pupils. In English their reading, writing and comprehension must be related to their day-to-day experience or to the kind of life they are to lead later on. Their reading comprehension ages should have been raised to at least 11½ or 12 to enable them to cope with later experience. There is a great emphasis placed on oral work and all devices and methods possible are used to increase their confidence in talking and conversing. Drama, choral speaking, quizzes, debates, lecturettes, committee work and interviews all have their part to play, always being carefully and purposely aligned to their personal abilities and range of interests.

In mathematics the aim is to provide work which will not only catch the pupils' interest and imagination but will also enable them to succeed and gain confidence in their manipulation of numbers. Regular basic drills must be maintained, but not to the boredom of the pupils. All the children have their own mental ages and rates of assimilation and progress, and

therefore are treated as individuals and their work geared accordingly. Though a text book may be useful for examples, over-strict adherence to it must be avoided and very often the ingenuity of the enterprising teacher is taxed to the limit in this field.

In history the syllabus for the first three years in school has one essential core regardless of the ability range of the children. The presentation treatment and understanding will of course differ. In the slow learner department the general approach is practical. Dramatization plays a great part. A very fine balance has to be struck between the teacher and the children, between what the teacher must of necessity teach and what the children can absorb at one time, and what they can accomplish by a combined effort. This is crucial in this range of ability. Similarly in geography the balance has to be struck and learning comes from experience, research, and active participation on the part of the children and not from neverending factual teaching, the copying of notes, etc. In art and craft a very vital stimulus is absolutely necessary if anything creative or imaginative is to be achieved. The widest variety of activities - drawing, painting, modelling, weaving, puppetmaking, rug-making, felt-working, etc. - must be employed to excite the children and bring them satisfaction and enjoyment.

Methods of teaching practical subjects

In the practical subjects, taught by the technical and domestic science departments of the school the same principles are adhered to. The work more often than not stems from the individual child's own inclinations and interests and the results are remarkable. In music, where the old rigid teaching is cast aside, the children make music of their own choosing and in ways they enjoy. Modern music and rhythm have a great part to play. General science bears a distinct relation to the scientific principles with which they are familiar in every-progress and records

Throughout all teaching the individual teacher is at the hub of these activities. The teacher has to know each child as an individual. Consequently, as the child progresses through school, very careful records have to be maintained about the child in all his many aspects in order to avoid repetition of material and retardation of progress, and to foster a quicker understanding of a child by anyone new.

Conclusion

An apt conclusion to this outline of the work of the Slow Learner Department comes in a question taken from *The New* Curriculum by Professor Ben Morris, Director of Bristol Institute of Education:

'If the school is a place where intellectual development takes its proper place within a wider perspective, then the school must be devoted to giving children and young people the opportunities needed to master the essential arts of civilized life

i Love, sympathy, respect for others

ii The enjoyment of the world, of beauty, of shared experience, of the mystery of an unfathomable universe

iii Cooperation

iv Aspirations towards personal and community achievements in the whole range of civilized activities

v Responsibility for one's own actions with which goes a real measure of independence of mind and heart.'

19 The role of the remedial department in a comprehensive school

K. Williams

Given this general title it is tempting to write with enough generalizations to appear to be liberal minded and forward looking, and enough learned quotations to appear scholarly; but instead I intend to write of what has happened in one remedial department at one comprehensive school. If at the end the role is still not very clearly defined and value judgments seem to have been made without any valid basis except that of expediency, I can only say, 'That is how it was, this is how it is'. Were it a simple matter we would all have found our role and the answers to our problems of organization years ago and there would be no need for this symposium.

In 1954 a new, purpose-built, co-education, comprehensive school opened on the outskirts of Bristol with a six form intake of first year children. One form was selected by eleven-plus examination from a wide area and the other five forms came from the immediate environment of the school, a postwar, lowrental one-class council housing estate. A headmaster and deputy were appointed together with ten members of staff, each of whom was to be the head of an academic department. Before the end of the first year, the well-qualified heads of department, most of whom had had only grammar school experience, were having difficulty in teaching and in some cases controlling, the bottom stream of the six. At the end of that first year I was appointed to the school to teach and advise on education of the bottom stream. But now there were two bottom streams, first and second year, and only one remedial teacher; so, I divided my time between them and helped other members of staff by drawing up schemes of work suitable for the children and giving advice where I could. More appointments were made and by the time the school held the thousand children for which it was designed, there were four remedial teachers, each with a class, first year, second year, third year and fourth year and each with an allowance above scale for his or her work.

Like any group of teachers

What are we trying to do in our classes? Overcome illiteracy and innumeracy certainly, encourage the children to be aware of and understand their immediate and wider environment, foster a delight in music and painting and movement, give them an opportunity to develop and enjoy manipulative skills. Our aims were similar to any group of teachers in any type of school, irrespective of the abilities of the children. We did not divide our timetable into limited periods for the study of separate disciplines but the subjects were taught through projects and interest centres and occasionally by more formal techniques. But why teach in special classes? Why create a remedial department?

In loco parentis was much more than a legal term with the children in need of remedial help. Apart from those who had only one parent, were fostered, or in the care of the local authority, others had poor relationships with their parents; most came from homes lacking any cultural stimulation acceptable to the school or a wider society, and some had parents who were themselves illiterate, innumerate or inadequate. These children were not very adaptable. They were confused by the transfer from a small junior school to a large comprehensive school; they easily became physically lost in the building and mentally bewildered by the size and complexity of the organization, so we created a class base for them with a father or mother substitute to care for them. We provided an area of security from which the children could explore relationships with the rest of the school, to which they could return for comfort or encouragement. Free of the need to compete on unequal terms with their peers they were able to gain confidence and a sense of achievement.

The extensive opportunities for the sympathetic observation of the children by the class teachers enabled them to distinguish between isolated naughtiness in a child and a deeper anxiety resulting in antisocial behaviour, and help could be arranged for those who needed it.

Springboard wanted

This system continued with some success for ten years. The children seemed reasonably contented and kept clear of trouble within the school. Most of them learned to read and to write, some transferred into the higher streams of the school and when they left school at the age of fifteen they all found employment of some sort. But I had some doubts. I was talking to a group of fourth form boys from another school and they excused their poor work, before I had offered any criticism or comment, by saying 'Well, we'm in the dimmers' class'. I wondered if my own children at school had given themselves a similar label and were, in consequence, carrying such a low self-image. Discreet enquiry led me to believe that they did regard themselves as inferior to the rest of the school and were most certainly regarded as inferior by their cleverer peers. That the children felt secure in their remedial classes there was no doubt: but their participation in clubs and societies, other than those organized by a remedial teacher, was very low. The secure base had become an area of retreat instead of a springboard to a wider society. Then there had been some changes in the original staff of the remedial department and I was concerned that some of our appointments had not been wholly successful. A teacher of unstable or disturbed children needs to have great maturity and confidence and I was worried that at least one of the staff seemed dependent on the children for emotional satisfaction and another was very possessive over 'her class' and was unconsciously hindering the wider social development I had hoped would emerge.

Again I was somewhat concerned about the composition of the classes. The number of children in each class was limited to twenty but the staffing ratio in the school made it necessary that each of the classes should have its full number of twenty pupils. Each year six or seven children were placed in a remedial class who may well have coped in another stream and acknowledging the self-image adopted by the children in the remedial classes, I was concerned that we may have been depressing the performance of these children. There was some transfer of children to higher streams of course, but others tended to be found to take their place and those joining

the remedial department in the second and third years were generally children who were failing academically because of adjustment difficulties. The remedial classes, for the older children particularly, were becoming pools of maladjustment. Some were helped considerably by the more permissive atmosphere and greater understanding of their problems, some were not helped at all, as far as I could judge, but the grouping of children together in this way, with a majority with a disturbed pattern of behaviour, was affecting the minority of stable children in each class. If they wanted the attention of the teacher, they too had to indulge in attention-seeking behaviour, or, if they were not prepared to do this, do what they could on their own and then withdraw into fantasy or play until the teacher was free to attend to them.

This seems a very bleak picture and I do not wish to exaggerate or create the impression that the remedial department was a failure. It was not; the measurable results of academic attainment compared favourably with any other school in the city and were considerably higher than the national average. The doubts and criticisms that I have described apply to most remedial departments although we are all reluctant, perhaps unable, to look objectively at what we are doing, especially if the organization appears to be working successfully.

De-streaming

In September 1965 it was decided to go some way towards destreaming the first year intake and I had to decide whether, as in many de-streaming schemes, the remedial department was to be excluded, or whether we should disband. It was decided that the remedial classes, as units, should go. The staff were cautious about de-streaming and eventually it was decided to organize the first forms into three bands of ability instead of six forms. The intake of 180 children was split up approximately as follows:

Band one 70 pupils
Band two 60 pupils
Band three 50 pupils

The pupils were placed in their bands according to ability decided by reports from the junior school heads, reading ages

and a NFER verbal reasoning test administered in the primary schools. Each band was divided into two forms alphabetically and in Band 3, sets were arranged for English and maths; this was so that we could have a remedial English group and another (but not identical) remedial mathematics group. This arrangement has now been carried into the second and third years but does not apply in the fourth year and above where the children are individually timetabled.

The problems of retardation stemming largely from social and family deprivation are still with us. A test of reading age carried out with first-year children entering the school show that forty-seven children, a quarter of our intake, have a reading age of less than nine years and are, therefore, more than two years retarded. That this stems from cultural deprivation rather than other reasons is evident.

A small number of children coming to us were quite unable to read and it was considered right to appoint a part-time member of staff to give these children individual help.

We were fortunately able to appoint a married woman with an excellent temperament and a very keen awareness of the social and linguistic needs of these children. She works with children singly or in groups of two and three and she concentrates first on building up confidence and establishing social contact. She has visited the homes of most of these children

and established a good relationship with the parents.

Some children in the school, not only those in need of remedial reading, have great difficulty with their personal relationships. They are frequently in trouble in school, at home, and sometimes with the police. Breakdowns in family life occur with a minority of the children and some have parents so inadequate that their lives have no stability. To help these children I have been given time for counselling and home visiting. So far over sixty children have been helped with varying degrees of success and there is an increasing demand on my time by children, parents and other members of the staff. After initial investigation, children have in some cases and with their agreement, been referred to another teacher, sometimes tutor or housemaster or any teacher with whom they seem likely to form a helpful relationship.

Social benefits

The realization that many of our children are retarded by social and family background is the main reason for reorganizing the school into house and tutor groups. The old method of form organization brought together homogeneous groups which remained isolated, culturally and socially within the school. The present method of tutor group organization with each group consisting of a cross section of the children in age and in academic ability has done something to break down the social barriers and in the tutor periods and the dining room. in games and in house activities, the free mixing and chatter between the pupils has helped to increase the vocabulary and social adequacy of the retarded. The greatest effort in social integration is made with the pupils who choose to leave school at the age of fifteen. This 30 per cent come mainly from among the more socially inadequate homes and some, though by no means all, are educationally retarded.

There are advantages and disadvantages to our reorganization. Five children in the first year are still not settled at the end of the first term in the school and for them a remedial class would have been a help. Two members of the staff are concerned, even bitter at times, at having to teach children who cannot read and write properly; so for them and the two lowest band classes they teach for five lessons a week, the lack of a remedial department has created an unhappy situation. On the other hand twenty-eight pupils from the original fifty in the bottom band have opted to stay on at school for an extra year. At least twelve of them would have been in a remedial class before reorganization and by comparison with previous years very unlikely indeed to have stayed on at school. Eighty per cent of the children from the lowest bands are actively engaged in at least one of the many evening activities that are organized after school and they are accepted by the other children and regard themselves as full and equal members of their groups.

Both the schemes I have described have their strengths and their weaknesses. I prefer the school without an organization of remedial classes and I have given some reasons for my choice. Neither scheme is perfect and there are individual

Remedial education: programmes and progress

children who have suffered under both systems just as there are individuals who have benefited under both. There may still be a need for the protective influence of a remedial class in the first year for a few children. All children find difficulty in transferring from a small junior school to a large comprehensive school and some of the children in need of remedial help are the most affected. Yet to create such a class is to segregate and label a group of children with the possible subsequent damage to their future acceptance by the rest of the school. In common with most schools we have a system of introduction, befriending and support for all our new children, but an eleven-year-old is still an eleven-year-old and immature. The solution would be the implementation of the recommendation in paragraph 386, Children in their Primary Schools (Plowden Report) for the transfer to secondary school to be delayed until the age of twelve years six months. This would benefit both the children and the secondary schools.

20 An oral approach to remedial English Sinclair Rogers

There are different standards by which we judge spoken and written English. On the one hand teachers rarely correct the speech of a child; and on the other hand an essay or a composition from the same child will be subjected to detailed correction both from the point of view of what is said and how it is said. No one disputes that to correct involves a series of value judgments; what is in dispute is whether the teacher can make the standard forms, i.e. the correct forms, habitual by concentrating on the child's written work.

To start by correcting his written work seems to be a little late, for apart from spelling errors, errors which occur in a child's speech will occur in his writing; and yet, if we take the primary form of language to be speech, and writing merely a symbol for spoken language, teachers can be seen to be correcting mainly the secondary manifestation of language. Could it not be that if mistakes in writing English were corrected using an oral method at least two important advantages could be gained?

1. The correction and improvement by an oral method will affect writing as well as speech.

2. The wider range of speech forms will help the child develop a more fluent and less rigid style of writing.

To explain the importance of an oral approach further, let us look at the way we transfer our thoughts from our mind to paper. When we sit down with a pen and paper we try to capture and explain the thoughts we already have in our mind. These thoughts are then turned into speech and it is this speech that we write on to the paper. What we write, and what the child writes, is the result of this inner speech. It has been shown that as somebody uses this inner speech his speech muscles, whilst not necessarily moving, are stimulated by the

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nerves communicating with the speech-centre of the brain. Even in adults, articulation in some form or other is an indispensable requirement for using the material of speech in a written form, and with younger children they sometimes need actually to mouth the words as they write them. It seems probable that without this reaction in the organs of speech, adults and children alike cannot perceive the full significance of words, and the relations between groups of words. For further evidence on this point consider the technique most of us have of reading over aloud any piece of a written text that we find particularly difficult.

From the above it would be expected that a bad speaker also writes badly: and this is generally the case, for analyses of the speech and writing of some Norwich children (Rogers, forthcoming) indicate that almost without exception errors occurring orally occurred in their writing. Again, given the prior appearance of speech, it seems reasonable to assume the errors in speaking are transferred to the writing and not the other way around. If then, the speech patterns of the child can be made more complex at the same time as making them more 'correct' then there should be a resultant good effect upon the writing of the child.

In order to make the correct forms part of the child's competence the older incorrect ones have first to be broken down and made to disappear. Clearly this cannot be done by asking the child to write more for this will only compound the errors. There should be selectivity in the grammatical points to be covered by an oral method at any one time for there is no need to spend time on such points which are already correct. From this it follows that each child in need of a remedial approach in English is better served by having a programme especially prepared for him. This individual approach needs, in turn, a careful analysis of the writing faults of each child. By a comparison with standard forms against his non-standard forms a child ought to be able to see that any programme devised for him will be relevant to him and useful almost immediately. A manufactured programme attempting to cover all the possible differences between correct and incorrect English would not be successful as it would dissipate an individual child's errors amongst a large number of forms he uses in a standard fashion. Errors which occur more frequently should form the greater part of a programme devised for a particular child.

Rote learning not required

So far the oral method has only been discussed in terms of what it implies for the teacher; for the child at school the oral method has a number of implications, but first of all it must be understood that what is required of the child is not rote learning. The child is not expected to repeat things parrotlike with only a minimum of thought. On the contrary, he is made to manipulate verbal patterns substituting one part for another and so on, doing it aloud and immediately. By responding aloud each child takes on a larger role to play in the classroom, in that he is required to reply each time instead of only occasionally. A criticism frequently made about oral methods which require the child (or whoever) to respond by imitating a given verbal stimulus is that they do not create the right conditions for an individual style to be developed. This criticism in turn may be countered by teachers of children in need of remedial help in language who made the seemingly reasonable remark that children who need such help do not have to be concerned with projecting their own personality, but should concentrate on making their language more correct. Nothing is further from the truth and an oral programme individually devised should be able to undertake the delicate task of enhancing a child's style of presenting himself on paper at the same time as correcting his errors.

In an oral method which demands that the child should think before replying the form of the drill should be openended so as to allow the child as much choice as possible or as he wishes. At no time should a child need to be limited to a set number of responses; this is unnatural in language usage and almost predetermines that the drills will be merely part of some stimulus-response mechanism. In this a remedial oral method should follow only for a short while, established language laboratory technique whereby the required response is triggered off by the teacher. A language laboratory method is to give the student the frame, for example,

he walks quickly and then the cue, slowly and the student responds with

he walks slowly.

This method involves little choice for the student who is not made to use his own language and intuitions. In the above example, for instance, he could have replaced the adverbial slot with a number of different adverbs or adverbial phrases. Any oral method which attempts to help children individually must be able to call on all the children's competence of English and not limit it to pre-determined responses. What must be limited for the purposes of effective and efficient learning is the nature of the original frame: given that the child is able to substitute and transform it at will, an important part of any oral exercise must be for the child to choose his own examples and vocabulary within the framework of the exercise. Examples taken from two exercises dealing with two different grammatical points concerning the verbal cluster will show what I mean.

A large number of errors are found in the use of tenses in the verbal cluster, caused mainly by the omission of suffixes such as -ed in the past tense and -s indicating singularity in the present tense. The first part of the first exercise is a comparison of the correct and the incorrect forms taken from the child's own work:

last night I ride my bike . . . last night I rode my bike yesterday I decide to . . . yesterday I decided to it was only then that I realize . . . it was only then that I realized.

If it is thought useful, this can be conducted most profitably as a discussion with a group of children who have this particular problem of confusing the relationship between expressions of time and the tense of the verbal cluster. The second part of the exercise consists of a number of sentences giving the basic framework and one sentence which is used as the starting point for the various phrases to be slotted in:

I finished the painting yesterday.
We sailed the boat over the weekend.
John collided with the wall this morning.
I paid for it yesterday.

I finished the painting yesterday.

Instruction. Put what follows into the place you think right and put all the verbs into the past.

1.	the car	11.	on a	trailer

2.	before	school	12.	pul

J. He starts	15. John, Ivial y a
6. a long time ago	16. badly
7. the shed	17. we row
8. they move	18. up the river
9 from the front to the	19. they anchor

back garden 20. with difficulty

10. the boat

After this, the last part of the exercise allows the child to follow the same sort of pattern without any constraints of original sentence or set responses. He makes up his own examples. This helps to give him confidence and to make him use language on his own and is also a very good check for the teacher to see how well the exercise has been understood and assimilated.

Another source of a large number of errors in written work is the agreement between subject and verb. The errors arise often from children forgetting the relationship between the subject and verb because there has been interposed between them one or more dependent phrases. This error is one which occurs often in speech, especially as part of an extended thought process; we all of us tend to allow the verb to agree with the last likely-looking subject noun or noun phrase. And so sentences of the type below exist to be corrected (again they are examples taken from the child's own work):

Sally, who thought she was going with us, have to stay at home. The men I saw at the station was repairing the track.

The time that they started most of the races were . . .

These sentences and their more correct counterparts are the first part of the exercise, allowing for some discussion on the problems arising from the necessity of the subject-verb agreement in English. The next part of the exercise requires the child to vary the basic framework or structure given by using a number of directed responses.

Remedial education: programmes and progress

Instruction. Add what follows into the place you think best and if necessary change the verb and any other word.

The colour I like best is yellow.

1. and blue

The fence I have just put up in the garden is 6ft high.

1. gardens

2. the fences which I made myself out of the best quality wood There is not space to give here all the sentences I have used in this exercise, but the pattern should be clear. As before, in the final part of the exercise, the child has to work out his own examples and try to transform them in a similar way. This part is always the hardest for the child and I have found that it takes a great deal of discussion and guidance to get him to think out an example for himself. There are, of course, many other exercises which have to be devised to be used with other grammatical points. Whilst the overall format of each exercise remains the same for each child, there may be small alterations made to suit individual requirements; but the child ought to be involved at the outset in selecting from his work those grammatical points which he sees to be wrong.

Individual work - group work

Much of the initial work deciding on the errors to correct using this oral method is better done with the individual child alone. It is better at the beginning to conduct the exercises oneself with the pupil; in this way the tentative efforts he makes at first in the third part of the exercises can be encouraged with a resultant effect on his fluency and control. But once the system is working and has been thoroughly understood,

groups can be created so that they can tackle a particular problem together. Members of the group can take turns at being the leader of the exercises and deciding on the correctness of the replies. There is often very useful discussion generated by the first and last parts of the exercise as the reasons behind preferring the correct instead of the incorrect forms are analysed. Some children prefer to work by themselves and not in groups and this is where pre-recorded tapes are helpful. In group work too, children may like to devise new exercises to record that can be used by their fellows. In using tapes, though, one ought not to fall into the trap of producing a readymade programme containing a number of exercises not deliberately produced for an individual. The best examples for his exercises come out of his work.

Obviously the areas which can be covered by an oral approach cannot account for all the skills used in writing. Such a method specializes in grammatical problems and leaves unsolved the problems of spelling and punctuation. But an individually designed programme can be most useful in solving a child's particular errors of grammar and morphology by attacking the medium of the language where the faults first оссит.

References

AUSUBEL, D. P. (1968) The Psychology of Meaningful Verbal Learning,

Grune & Stratton.

LURIA, A. R. and YUDOVICH, F. L. (1959) Speech and the Development of Mental Processes in the Child, trans. J. Simon, Staples Press (Penguin,

VIGOTSKY, L. S. (1962) Thought and Language, MIT Press. WILKINSON, A. ed. (1965) Spoken English, University of Birmingham.

21 A diagnostic approach to teaching reading to young adolescents

Desmond Swan

Learning to read is the first major hurdle to be crossed in every child's school career. It is an extremely complex task, involving not just isolated parts of the child but the whole child – eyes and ears, mind and emotions, feelings, experiences and attitudes; this task is so complex indeed that it is doubtful if anything he will subsequently learn will be as challenging, or as rewarding. It is also the cornerstone of education as we know it; with it there are almost no limits that cannot be brought within his reach, without it he is literally disabled.

What then of the child who, by the time he leaves primary school, is still unable to read, or does so only with great difficulty? He has not just stood still for several years – he has been growing and extending his direct experience like any other child in many directions – but in this most important source of indirect experiences he is coming to realize, if he can afford to admit it to himself, that life has already passed him by; he has failed.

Failure to read is a personal failure. The retarded reader sees himself not only as an inferior reader but as an inferior person. Since reading is a skill which adults around him regard as important, failure in this area tends to invade the whole personality. The result is a child who has come to accept failure as inevitable for him, and whose natural curiosity and enthusiasm for learning remains inhibited (Lawrence, 1971).

Here is where the reading specialist in the post-primary school comes in; not just teaching ordinary subjects to ordinary children but teaching a most difficult set of skills to exceptional children, that is children who have exceptional difficulties. I suspect that task may first of all be an unlearning one, that he will have to help these children overcome great personal fears and inhibitions, help them replace an ingrained

feeling of incompetence with the beginnings of self-confidence. One false move on his part may therefore be fatal; the pupil will quickly and mercilessly decide that even he is like the rest of the teachers he has met, and will opt out of school for good. The reading specialist or teacher of remedial reading has a very narrow margin of error within which to work, and must overcome barriers of all kinds. He must begin by giving the child a feeling of *immediate success* somehow. What then can the reading specialist in a secondary school do?

His point of entry must be to make some evaluation of the pupil's present levels, i.e. to diagnose the precise nature of the pupil's difficulty in reading. But, in fact, diagnosis is so important a part of remediation here, that an explicitly diagnostic strategy in remedial teaching is recommended. It may be carried out on three levels, the first two of which belong properly within the area of the teacher's competence (cf. Wilson, 1967).

First level: on-the-spot informal classroom diagnosis

This may sound like something new, but any good teacher is in fact constantly monitoring and assessing the pupils' performances as he goes along. He evaluates the child's level of functioning by observing his response to questioning, and to informal or ad hoc testing, e.g. by using a reading book appropriate to his class level. The teacher will be alert to signs of frustration, or to signs of readiness to move ahead to a higher level of work, thus preventing a major learning deficiency from building up. This kind of diagnosis is an integral part of all good teaching, and will be used by the teacher to determine any immediate adjustment of instruction to meet particular difficulties occurring.

Second level: more formal classroom diagnosis

This will be called for when the adjustment just mentioned proves unsuccessful. I think it may also be needed when a child has been sent along by his other teachers as showing a persistent weakness in reading; or again if a teacher finds himself starting off with a totally unknown 'remedial' group or class, though another name would be preferable for such

a class. Formal diagnosis involves the use of standardized tests, as well as other diagnostic material available. These standardized tests (e.g. Burt or Schonell, or Marino in Ireland) might be designed to yield a reading age in terms of years and months. They might be designed to test only one sub-skill of reading, e.g. word recognition, comprehension, or speed. Or on a more elaborate scale they might be designed to give a profile of the individual's reading levels across a whole range of sub-skills – e.g. Durrell Analysis of Reading.

Difficulty

Probably the first thing to do however, is to get a reliable indication of his present general level, and a test which yields an individual reading age is best to begin with. Beyond this, group tests of various areas may be available, cutting down on testing time. Now the teacher may well ask: 'So what? So I know he has a reading age of nine while his calendar age is twelve. What do I do next?' A big question here will be this: Is the pupil's apparent backwardness of (e.g. three years RA) a remedial backwardness or not? General intelligence therefore is something that must be taken into account; and intelligence measured preferably on a partly verbal and partly non-verbal test... but one that does not include reading tasks.

Now suppose a pupil has average intelligence, or more, or less, what next? What does the teacher do about his reading? Firstly, use a few diagnostic tests which are designed not to assess levels but to reveal specific difficulties (e.g. Schonell Diagnostic Tests). One can also gain valuable knowledge from experience in using even the Burt or Marino or other general tests of reading ability in a qualitative way. One can watch out for the usual familiar errors - reversal of letters, substitution of letters, and whether there is any pattern in the letters incorrectly read, or substituted. Does the pupil take his cue only from the beginnings or endings, or does he focus on the middle of all words, or what pattern emerges here? Are there any letters he consistently fails to recognize? A spelling test (e.g. Schonell) is also very useful as a diagnostic instrument, both for consistent spelling errors, and as a clue to hearing loss, or faulty de-coding from sound to visual symbol. At this point too, a check-list of common reading difficulties could also be used (cf. Ekwall, 1970; Wilson, 1967).

Diagnosis does not end with testing. The formal test programme may be the best lead-in to any pupil's performance, but the teacher must also extend diagnosis over days, weeks, and months, and keep the antennae always alert to problems at deeper levels than those mentioned, e.g. in attitudes, feelings, motivation. Problems at these levels however, may still best be dealt with through working on the level of reading itself. Informal or formal diagnosis may also be usefully filled out in a pragmatic way by trying out the pupil on a well graded series of Readers, going right back (but unobtrusively) to the level at which he can read (if any). School records may also tell a lot, either about the child, or about his previous teachers! All these will lead the teacher to formulate hypotheses, or elicit patterns of symptoms, explaining the child's difficulties and yielding a basis for a carefully planned reading programme.

Third level of diagnosis

However, it is possible that the reading problem may only reveal larger ones which lie outside the teacher's scope of possibilities. This is the third level of diagnosis. In this case, under reasonably ideal conditions, referral to a medical doctor, psychologist or psychiatrist is indicated. Their findings may be requested and recommendations used by the teacher, or they may suggest treatment at a child guidance clinic.

Remediation

Before discussing remedial strategy and tactics, it will help to explore just what can be achieved by a good teacher even coming in at the 'eleventh hour', or the eleventh year of the child's life when the problems are already deepseated. It is surprising how many wider symptoms can sometimes disappear with the first flush of success even in a young adolescent. School curricula as we know, are geared to meet the needs of the majority of children. Thus a remediable backwardness may emerge in a sensitive area like reading, even when a child has average intelligence. Indeed reading problems do not

always confine themselves to this area - they have wide ramifications, especially by the time a child has reached eleven or twelve; they are often accompanied by emotional problems, e.g. a very poor self-image, by reason of ingrained attitudes of failure or lack of self-confidence. Hostility to teachers, to school and even to classmates may now be established, so that it can be quite difficult to tell which came first, which is cause, and which is effect, the reading problem or the emotional one. But probably the best hope of success in the emotional area, is success with the reading problem itself, though this may be tackled directly through drill, exercises, perceptual training, writing, etc.; or it may be tackled indirectly through art, through mime, through the therapeutic release offered by spontaneous drama activities, etc. The latter approaches demand a lot of skill on the teacher's part, and awareness of the risks that may be involved. Individual counselling has also been found helpful - in one study, ongoing interviewing by qualified counsellors was as successful as formal remedial teaching in reading. Above all, the development of an accepting, constructive, personal relationship with each pupil may be the most vital common factor in all these different approaches.

Remediation arises naturally out of, and is linked to, diagnosis at every point. If the latter is not to be regarded as beginning and ending with formal testing, neither should a teacher think in terms of narrow strategies when it comes to remedial teaching. Both are really twin aspects of the same ongoing process, one that is self-correcting and self-enhancing. Corresponding to the classification of diagnosis, a three-level strategy of remediation is suggested, within which any teacher will apply his repertoire of 'methods', structured or unstructured.

First level

Informal, on-the-spot remediation refers to the teacher's immediate response in terms of teaching, to observed difficulties of the pupil with specific reading skills or areas. Again we think of this as part of normal class routine with any class; but its importance lies in its timely prevention of minor

problems that could through time accumulate into serious ones

Second level

Remediation here will apply to major difficulties that have been discovered, but are still within the competence of the class teacher, or at any rate of the reading specialist in the ambit of the school to solve. More thoughtful strategies than merely changing to another reading 'scheme' are now likely to be demanded, as a result of knowledge gained from the individual's diagnosis. Possibly nothing more than for greater individual attention than the class teacher can afford, is all that is required: this can be provided for instance by teacher aides.

Alternatively some less well known techniques may be called for, e.g. the 'language experience' and the VAKT (Verbal-Auditory-Kinesthetic-Tactile) approaches. Each of these has specific advantages for certain types of pupil. The 'language experience' is a speech-to-reading method, but the speech in question is that of the pupil, not of the teacher or of the textbook. Reading is taught by using written material of the child's own words, or those of a classmate, thus exploiting familiar vocabulary, concepts, interests and experiences. The artificiality of the textbook, which often in fact hinders learning by the weakest pupils, is bypassed; reading arises out of a context of live communication and meaning already apprehended. Practice exercises (e.g. phonic drill) will be used later, and only as they may arise out of the reading done (see Stauffer, 1969). A versatile teacher will easily adapt this for children with any level of reading difficulty and with many kinds of problems.

The advantages of VAKT are similar, but that here the tactile-kinesthetic sensory channel is exploited, offering something new to children for whom traditional reliance on the purely visual-auditory channels may have failed. This approach is found useful with children who show a severe degree of backwardness, but are without specific skill disability. A sample is given by Wilson (1971). It may indeed complement a 'Language Experience' technique.

Third level

This too is thought of as a matter requiring referral to outside agencies, where the resources of the school are found inadequate to cope with an individual's problems. It may take the form of psychiatric help, or intervention by similar specialized agencies to remove a more deep-seated cause of reading failure, whether within the child or arising out of unfavourable home conditions. Between these two levels, however, it must be admitted that sometimes a change of teacher or a change to a school that offers smaller classes or greater expertise, has been found quite sufficient to bring improvement.

Probably every identifiable 'method', whether tightly or loosely structured has something to recommend it. Sometimes indeed children succeed in learning to read in spite of the method rather than because of it. No single approach guarantees success to every child, while the most successful teachers seem to be those who, out of painstaking experience and personal reading have the widest range of approaches at their finger-tips. They seem almost intuitively able to select, discard, combine and invent schemes to meet particular needs and difficulties. Indeed the teacher is more important than the tactics as such. But it is here recommended that an explicitly diagnostic and systematic strategy, learning by one's own mistakes and enabling the child to learn by his, in the context of a good human relationship, offers the best hope, especially with 'last chance' pupils.

Bibliography and References

BURT, C. (1962) Mental and Scholastic Tests, 4th edn., Staples.

DURRELL, D. (1955) Durrell Analysis of Reading Difficulty, New York, World.

EKWALL, E. E. (1970) Locating and Correcting Reading Difficulties, Merrill Publishing Company.

LAWRENCE, D. (1971) 'The effects of counselling on retarded readers', Ed. Res. 13, no. 2, February

O'SUILLEABHAIN, S. V. (1970) Marino Graded Word Reading Test, Dublin, Longman, Browne and Nolan. SCHONELL, F. J. and SCHONELL, F. E. (1965) Diagnostic and Attain-

ment Testing, Oliver & Boyd.

STAUFFER, R. G. (1969) Teaching Reading as a Thinking Process, Harper and Row

Remedial education in secondary schools

WILSON, R. M. (1967) Diagnostic and Remedial Reading for Classroom and Clinic, Merrill.

Materials and resources for remedial education

The available materials and resources greatly outstrip the supply of teachers able to utilize them. This could be one's reaction after a glance through the contents of this section. One of the most valuable assets, the radio, is rarely exploited; in conjunction with a cassette tape recorder and simple headsets, the BBC provides a tremendous amount of first rate material, and this can be highly topical and immediate now that local radio stations are appearing (Valentine and Quayle, 28, p.222). Although most schools are wired for radio broadcasting in every room, one rarely finds good use being made of this facility. This remains true of TV as well, though the potential is obvious (Whittaker, 25, p.206) and a competent teacher can create tremendous enthusiasm around the increasing number of excellent transmissions intended for less able pupils.

Much careful preparation is required, of course, and a well run classroom or department for the educationally handicapped has something in common with a well run office or department store. Too little is being done to encourage the teacher as a manager of resources. While some of the devices described are exotic, most are within the compass of the poorest budget (games and comics, Johnson and Johnson, 27, p.216). We might, in this context, do well to look again at existing school resources (oscilloscope, Dyer, 23, p.197), and some audiovisual programmes are relatively cheap (Brown, 24, p.201).

22 Concept 7–9: its relevance in remedial work

John Worsley

Concept 7-9 is a course in language and reasoning developed by a Schools Council Project at the School of Education, University of Birmingham. The Concept 7-9 materials have been designed for use at the infant/junior transition period. However, during the national trials they were also used with older slow-learning children in normal and remedial classes. The course consists of three basic units: Listening with understanding, Concept building, and Communication. For schools with children of West Indian origin it is recommended that in addition to the three units the Dialect Kit is used as well. Each unit deals with a specific range of skills and the emphasis throughout is on the child making use of his existing language resources. At every stage of development the project team kept three goals in mind:

- 1. The child should be aware of what was expected of him.
- 2. Success should not always depend on reading or writing skills.
- 3. The activities could be carried on without the constant intervention of the teacher.

Unit 1. Listening with understanding

This unit is concerned with the child's ability to listen to a variety of instructions and successfully carry them out. The instructions are presented in the form of language themes pre-recorded on standard cassettes. It is now well established that the prestige attached to the use of a tape recorder and headphones can motivate previously apathetic or hyperactive children to achieve good results. The careful grading of the language themes ensures that any lack of reading or writing skills will not place them at a disadvantage. The themes deal with the language of time, comparison, position, cause and effect, hypothesis and the deduction of meaning from context. Clearly these are areas of language that are vital to the child's understanding of what is going on in the classroom. Teachers have reported that children who have had difficulty in reading with understanding have been particularly helped by the theme dealing with the deduction of meaning from context, as it seems to make them aware that they can get clues about one word's meaning from other words in a sentence. Teachers have also used the themes diagnostically and have found this approach very useful in assessing the abilities of second language learners.

Unit 2. Concept building

Linked with many of the intellectual processes involved in Listening with understanding, the Concept building unit aims to get the children familiar with some of the linguistic structures associated with the formation of new concepts. A range of pictures are sorted into classifications.

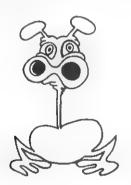


The emphasis is on the children being able to describe essential attributes in terms of their similarities and differences rather than simply learning the names of a variety of items. The teacher's manual contains a number of suggestions for ways in which this unit can be integrated with other subjects in the primary school. Poor readers are helped considerably by having plenty of opportunity to hear and say a range of structures before coming to them in follow-up writing activities.



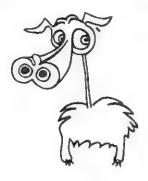
Unit 3. Communication

During the research stage of the project (see Schools Council Working Paper No. 29) it became apparent that tasks involving description and inquiry presented problems to many of the children. This unit involves children in pair and small-group activities where they are presented with real communication situations. Situations where one child describes a variety of things and another child tries to replicate what has been described. Other activities involve the children in a range of inquiry strategies.



Important features of this unit are that the children are able to draw on their own language resources and also make use of new vocabulary which they have learnt from their partners. The teacher does not have to be on hand to keep the language flowing although he may like to note what are the common causes of misunderstanding and perhaps introduce the items to the children.

Remedial education: programmes and progress



There is a film showing the materials being used. Further information about the course or the film is available from: Concept 7-9, Teaching Research Unit, School of Education, University of Birmingham; or from the publishers, E. J. Arnold & Son Ltd, Leeds.

The Dialect Kit

The Dialect Kit does not have quite the same remedial application as the three basic units. However, it is hoped to write about the kit in a future article.

Use of the oscilloscope to solve a particular 23 reading problem

Christopher Dyer

When he arrived with us from his junior school, Adrian obviously had a reading problem. At 8.6 on the Daniels and Diack Standard Reading Test and 8.9 on the Neale Analysis of Reading Ability test he was some three years behind his chronological age. Nevertheless, he was a bright lad and his general level of attainment and interest did not merit his being put with an exclusively remedial group full-time. He was an exceptionally gifted footballer and this gave him a high level of self-confidence and general popularity. As there was opportunity to take some pupils from classes for special individual help, he was selected in the expectation that his own keenness and general intelligence would help him, in a oneto-one relationship, to catch up quickly. The teacher assigned to his problem was young, not experienced in remedial techniques but with a good pupil relationship and very enthusiastic. Since Adrian had been taught reading exclusively on the Look-Say method it was thought that some coaching in a basic phonic approach would show quick results. We were using an adapted Gattegno Words in Colour approach, largely because none of the pupils had met it before, and so it had, for them, no history of 'failure rating'.

Not deaf

Alas, after half a term he was referred back by his teacher as being no further forward and, apparently, unable to grasp or at any rate, retain, ideas. A quick 'game' with the vowel colour chart with another teacher confirmed that, indeed, he did not retain a sound-letter relationship for very long, but another suspicion dawned and probably should have dawned earlier: he might not hear the sound properly. This appeared more likely when a tape of the reproduction of sounds suggested that his vowel reproduction came out as a rather formless but ubiquitous (9). He had probably escaped detec-Reprinted from Remedial Education, 8.1, 1973.

tion up to that moment in the general slurring that occurs in East London enunciation and the fact that his meaning in context was usually obvious. Being short of audiometry equipment and especially audio-discriminatory treating techniques (and which school isn't?) it was a question of backing a hunch or sending him through the 'usual channels' which would take ages. In fact he was referred to the clinic with notes on our suspicions and returned marked 'not deaf'. Well, we knew that! What we did not know was just how potentially good his reading was since he read with more understanding than his pronunciation might lead one to expect. He knew for instance, that bat was a thing to play cricket with, even though he pronounced it as something between 'bet' and 'but'. Obviously, however, beyond a certain point, he did not have the means to come at new words with any degree of accuracy: he could not be sure, even when he heard a new word moderately correctly, which of the vowel phonemes it contained nor could he be sure which to try to reproduce when confronted by a letter.

To confirm our suspicions, therefore, we decided on a test with a piano. Adrian was interested in 'music', his music teacher reported, although we had no evaluation on tone deafness or ability to sing, etc. He was tested by being asked to say if one note was 'higher' or 'lower' than the previous one given. Significantly he could give correct answers to all notes in close proximity, say B and Bb but failed all the time with notes played precisely an octave apart unless the jump, indeed, was three octaves apart.

It appeared that a substitute for aural learning of vowels would have to be found within the existing resources of the school if Adrian were to be helped at all quickly. In the science department was the very thing: an oscilloscope. With their cooperation in rigging a microphone to it, we could introduce Adrian to the idea that a sound had a shape all of its own and it was only convention that dictated that that shape be represented as 'a' or 'i' or 'u'. Moreover, here was a visible means for him to see if the sound he was making measured up to the shape that his teacher was making and if not what he could do about it until it did.

The first step was to establish pattern recognition. Commencing with 'a' and gradually working through the vowel sounds using the five main phonic enunciations, Adrian learned to marry up the shape on the screen with the shape of the letter. Once this stage was reached the sounds were given 'hidden' in simple words: bat - bet - bit - but and the nonword 'bot'. This stage was essential to establish that there were recognizable differences between the pronunciation of each of these words as far as the vowel was concerned and to encourage him to realize that such differences were readily recognizable on the oscilloscope although as yet he could not reproduce them in his own speech. He was, as we knew, a 'bright lad' and picked this up quickly and enjoyed the competitive element in deciding which word from a set on a card had been enunciated by the teacher on the evidence of the vowel shape on the screen - being able to pick it up in the middle of the word provided the word was said slowly and the vowel emphasized. We gave him a 'par for the course' decreasing with each of the first few sessions.

Breakthrough in understanding

The next necessary stage was to give him experience of enunciating the sounds for himself. This was much more difficult since he had never made any conscious distinction between them. Now, for the first time, he could see his mistake: he knew he was not getting through and why he was not getting through. He tried an 'a' and made it look right: he tried an 'e' and it looked just the same. He could see he was wrong and asked to be put right. The important point here is that he now knew what he wanted corrected - his shape on the screen: and he knew what was wrong with his technique when he wanted an 'e', he and everyone else saw an 'a'. This was the breakthrough in understanding we were after.

To 'correct' his technique we made him put his finger and thumb on lip and larynx of his teacher while his teacher enunciated and then on his own as he enunciated, watching the screen all the time. Soon the teacher dropped out of the session and he tried sounds on his own from cards held up by his teacher. At first the teacher 'corrected' the enunciation by not changing to another card until satisfied but ultimately Adrian 'corrected' himself: soon spontaneously attempting sounds without fingers to lip and larynx, only briefly restoring them if he found difficulty in achieving a 'correct' shape. Once he had the *feel* of the sound we could begin to take him off the oscilloscope and work with Gattegno Colour Fidels and Word Charts (Gattegno, 1969).

He progressed very well through these latter aids and was soon on to black-and-white reading at his own age level and interest level with more confidence than he had had before and, certainly, more chance of recognizably enunciating the build-up of words which he had not met as sounds before. One throw-off from his work with the oscilloscope and finger technique was that his spelling from questions – 'Adrian, how do you spell so-and-so?' – improved out of all recognition because he had picked up the art of lip-reading the formation of the yowels.

The importance of this case to us was, probably, not that anything new was achieved: it was, after all, only what a teacher of the deaf would not bother to give a second glance at; but that in a school with apparently few special resources, the resources were found to be there all the time, given the cooperation of another department; and, moreover, by this cooperation the interest in children with specific difficulties was enlarged. We are sure that our colleagues became more interested in Adrian and his problem through aiding him with technical advice – talking about which knobs to turn to obtain the best picture and so on. Specialist workshops are all very well and it would be very nice to have them: but it probably makes more economic and educational sense when cooperation ensures that what is actually there is used as widely as it can be.

References

DANIELS, J. C. and DIACK, H. (1958) Standard Reading Test, Chatto & Windus.

GATTEGNO, C. (1969) Reading with Words in Colour, Educational Explorers.

NEALE, M. D. (1966) Analysis of Reading Ability, 2nd edn., Macmillan.

The use of an audio-visual reading 24 programme

Neil Brown

This is an account of an investigation which took place in Dalton Special School, Lanarkshire.

Sixty-four children aged between twelve and fifteen years, with IQs of 50 to 75 and a Burt Reading age under seven years, were divided arbitrarily into three groups:

- 1. A control group the traditional reading group which used the reading books and teacher-pupil interaction normal to the senior special school.
- 2. An experimental group the programme group which used a reading programme designed by the author for ESN children, in conjunction with a Language Master, a tape recorder and illustrated booklets, and making use of a feedback system incorporating criterion test booklets of multi-choice items.
- 3. An experimental group the interaction group which used the same reading teaching as the control group, in addition to playing with, but not reading with, equipment similar to that used by the programme group.

The investigation was carried on over a period of three years within the normal ongoing classroom. Thus at any given period an observer would have seen some children being taught by traditional methods and simultaneously others working with the programme materials. The only part not held within the ongoing classroom was that part unique to the interaction group, described later. By holding the investigation within the classroom the clinical artificiality so common to the experimental situation was avoided.

Three areas were examined:

- (a) the effect of audio-visual programmed reading on the word reading ability measured by the Burt word reading
- (b) the effect of the Interaction Group on the word reading

ability measures by the same test;

(c) the long-term effects of the above two approaches.

Hawthorne effect was minimized by allowing all the children in the programme group three months of familiarity with the Language Master in a non-reading context. The use of the tape recorder in both reading and non-reading context was a common one throughout the school.

The groups used

The traditional reading group

A control group, known as the traditional reading group, comprised twelve boys and eight girls. This group was required to reach its objective – an increase in Burt reading age of one month – under normal classroom conditions. Reading age was calculated before and after twenty-eight days of teaching which were not broken by holidays. Each individual session lasted ten to fifteen minutes but this was flexible allowing for each child's interest or lack of interest, and the strength of his interaction with the teacher on any given day.

The programme group

The programme group consisted of sixteen boys and eight girls, divided arbitrarily into those who were to work through the programme of twenty-eight days' teaching individually or in pairs. The terminal behaviour of the programme group was to be one month's increase in Burt reading age. No comprehension was to be evaluated. As a result of what had been termed an 'interplay effect' in the pilot study (Brown, 1967) it was expected there would be a greater increase in the reading ages of those working in pairs than of those working individually.

The materials used by this group were:

- 1. tape recorder and booklet frames
- 2. the Language Master and card frames
- 3. reading booklets
- 4. criterion test booklets

Each session began with the child pressing the 'pause' button of the tape recorder which had been pre-set. Selfexplanatory instructions were first given on the tape and there was recorded what was written on the booklet frame; this was followed by a pause which allowed the child, who was following the words in the booklet frame with his finger, to say these words aloud. This 'repetition period' was followed by a second playback of the written words.

The child was then instructed by the tape to turn to the next booklet frame, or before doing this, to fulfil orally, or actively, or both, simple commands - perhaps pointing to a particular word or words in the booklet frame and saying them aloud. The final instructions given by the tape recorder at the end of each booklet frame unit required of the child some activity such as reading words in a test frame, or listening to a story and drawing a picture conjured up by it.

The child was then instructed to go to the Language Master where he would work through the relevant card frames.

At the completion of each unit, each child was required to work through a test booklet of ten multi-choice items. The criterion of success here was nine out of ten correct. If this criterion was not satisfied, the child had to repeat the complete unit.

The interaction group

The interaction group consisted of ten boys and ten girls. This group, in addition to using the method employed by the traditional reading group in the normal classroom, worked in the author's classroom when it was empty, for twenty-eight sessions lasting between thirty and forty minutes. Each child worked in groups of twos or threes.

The materials used by this group were:

- 1. dominoes cards
- 2. time situation cards
- 3. tape recorder
- 4. art materials

The dominoes cards and the time situation cards were taken from Gunzburg's Social Education First Aid (1968) materials.

The technique used by this group fell into two parts

1. that used by the Traditional reading group;

2. that used for the special materials.

A flexible outline of usage was adopted for this second part. This consisted of fifteen to twenty minute structured and unstructured sessions with the tape recorder. Unstructured work consisted mainly of garbled jokes and asides into the microphone, while the structured work turned around a 'yes, no' game, a 'question and answer game' and a 'tell a story' game. This was followed by a ten to fifteen minute session using informally the SEFA cards, general conversation and drawing. The children worked through the techniques of their own particular groups for twenty-eight successive school days. Pre- and immediate post-tests were administered on both Burt and Vernon word reading age scales. Further, the Burt test was administered to nine children in each of the three groups three months and twelve months after the immediate post-test.

Analysis of variance was used to calculate significances.

Conclusions

1. Programmed teaching with this population produced more significant results in word recognition than did traditional reading teaching (p < .01).

2. The combination of interaction technique with traditional reading technique in the experiment resulted in a significant $(p < \cdot 01)$ increase in word recognition when compared with the traditional reading technique.

3. The gains made by both the experimental groups while being significantly different from the traditional reading group were not significantly different from each other.

4. There was no significant difference between children using the programme individually and using it in pairs.

5. Analysis of variance had shown a difference in pre- and immediate post-tests given to both the interaction and the programme groups; there was no significant difference between these groups nor between them and the traditional reading group when the results of testing nine subjects in each of these three groups under four time conditions (pre-test, immediate post-test, three months later post-test, and one month later post-test) were subject to analysis

of variance.

6. An increase, though not a significant one, was made by the traditional reading group over the year. This, tentatively. may be attributed to maturational growth.

7. Very large and significant decreases were made by both the interaction and programme groups over the year. The decrease of both these groups were of such an order that it is possible to conclude that the reading attainment of these groups had returned in the space of a year to the standard which might be expected - when compared with the traditional reading group - had these two experimental groups not had one month's special treatment.

It appears, therefore, that with this population the special treatment lasting as it did for the short space of one month, while in the short term resulting in significant increases in reading attainment, in the long term was of little value.

In so far as this conclusion is true, it shows that the artificial 'forcing house' atmosphere of the programme treatment and the relaxing atmosphere of the interaction situation have the same short- and long-term effects for the mentally handicapped as reported by Henry (1963), Hillman and Snowden (1960), and Pringle (1962) among others.

Nevertheless, it is suggested that a teaching situation developed along the lines of a build-up of self confidence such as the interaction group in combination with audio-visual programmed reading, may be more beneficial in the long term to senior mentally handicapped schoolchildren than the more traditional reading teaching methods have been.

References

BROWN (1967) The Language Master in a Special School. Bulletin of the

Glasgow University Prog. Learn. Unit.

GUNZBURG (1968) Social Education First Aid, SEFA Publications Ltd, 240 Holliday Street, Birmingham 1. HENRY (1963) 'Study of Short Term and Long Term Results of Remedial

Teaching in Reading', unpub. M.Ed. thesis, Birmingham.

HILLMAN and SNOWDEN (1960) 'Part-time classes for young back-

ward readers', BJEP. PRINGLE, M. L. K. (1962) 'The long-term effects of remedial education. A follow up study', Vita Humana, 5.

Using a television programme to stimulate language and reading

Ena Whittaker

This method, which came from the children themselves, was used in a remedial centre by a group of sixteen children, who came for one hour of tuition every day. They were withdrawn from their school each day at the same time and transported by special bus to a remedial centre which had been established in a big junior school, but had no connection at all with that school. The function of the centre was to serve the twenty-two junior schools in the district, helping those children who had problems in reading.

The children's chronological ages varied from eight to ten years old. Their reading ages were from five to seven years. Most of the children came from home backgrounds that were

language starved.

Experiences involved:

- (a) dressing-up
- (b) mime
- (c) use of vocabulary in correct context and adequate sentences
- (d) reading in the papers about themselves
- (e) listening to the radio
- (f) meeting the actors involved in television programmes
- (g) writing
- (h) painting.

Dressing-up

A 'dressing-up' box had previously been provided and used with relish for other 'made-up' plays. Each child chose to be a character from *Coronation Street*, choosing of course the most well-known ones, i.e. Ena Sharples, Elsie Tanner, Len Fairclough. When the children were dressed up we then pinned labels on their costumes saying who each child was

pretending to be. The most popular scene without doubt was the 'Rover's Return'. The children talked quite naturally to one another under the disguise of the television personality.

Mime

Mime followed quite easily, and such actions as glasses being polished, and wiping the bar were very popular. Facial expressions were achieved which we had never seen expressed in this type of child before. Boys took the female parts quite readily and their movements were unbelievably good.

Use of vocabulary in correct context and adequate sentences

Speech represented no problem at all as most of the children were so familiar with this programme. They conversed naturally and easily. Words were used in their correct context and adequate sentences were repeated. There was no embarrassment at all amongst the children. Each child seemed to have chosen a character that suited his emotional need and personality.

Painting and writing

From the acting and miming we then developed painting and writing. The children were eager to paint their own character and write, with our help, about the part each one played in the serial on television. We made our own Coronation Street Book, with paintings of the street, various houses, the 'Rover's Return' and the Corner Shop. We finally wrote to Granada, enclosing a painting by one of the boys. To our delight we were sent, almost by return of post, some forty pictures, each one of a different aspect of the street. These were then displayed on the walls under various headings, such as, 'Rover's Return', 'Elsie Tanner's House', 'Corner Shop', etc. The photographs of the television personalities playing their roles in Coronation Street were mounted individually and much vocabulary work was done on these. Each photograph was discussed with the children and new words were introduced to their vocabularies. for example:

'How do you think Elsie Tanner looks?'

Remedial education: programmes and progress

'Sad.'

'Try to give me a better word.'

Eventually, after much groundwork had been done, the children began to recognize such words as 'pensive', 'meditating', 'cynical', etc.

Reading in the papers

We were taken by surprise when the Daily Mail rang through and asked if they might come and take photographs of the children. Apparently they had a contact in Granada. We gave permission and the children were delighted to dress up for a real photographer. We had taken our own photographs, but the prospect of being in the daily papers was much more thrilling. The photographs were duly taken and appeared in the Daily Mail. Next day the children ran in to the centre excitedly discussing their own school's individual reaction to the news. We all read and re-read the paper together and some schools had cut out the article and displayed it in a prominent position in the hall.

Meeting the actors

Our next big thrill was when Granada rang up on behalf of the actors, who had expressed a wish to visit the children. We kept this secret as we did not wish to have a wholesale onslaught from the general public. Those actors and actresses who came were Violet Carson (who plays Ena Sharples), Peter Adamson (who plays Len Fairclough), Stan and Hilda Ogden, and Audrey and Gordon Clegg. The children were thrilled and the actors talked and played games with them. They were pleased to see our walls overrun with their photographs and the children's own portraits of them. These were duly autographed and a famous hairnet was pinned on the wall. Photographs were taken by many daily papers. The next day, again the children ran eagerly into the centre displaying newspapers, and we read all about the visits in six different ones.

Listening

After the excitement of meeting the actors, we felt that this must surely be the end of the story, but the following week,

the BBC World Service, broadcasting in the south of England and abroad, rang up and asked if they could come and tape the children conversing with each other and also interview us on our views.

The children were delighted to hear themselves chatting in the 'Rover's Return', and were very excited when they realized that many other people would hear them too, when the programme was broadcast at a later date. We felt that the whole experiment had been a huge success, as it had involved so many different experiences for these children, who, themselves, came from backgrounds similar to Coronation Street. By using the acting and miming methods described, we felt that many emotions had been 'played-out', some of which had hitherto been holding back the reading progress of some of the children.

That was the beginning. Many more television serials were used to stimulate similar activities, but of course not with the same 'entertaining' results. From using television programmes we were able, very gradually, to move on to such classics as *The Jungle Book*, and *Doctor Dolittle*. We were only sorry that we had to disappoint the little boy who asked plaintively,

'Please, can't you ask Steed to come from the Avengers?'

26 Television programmes in a school remedial reading scheme

Betty Dunning

The teacher of backward and slow reading children needs various aids. We hear a lot about visual aids which are available under many education authorities, but one very important one, overlooked by some, is the need to have access to a television screen, to enable these slower children to take advantage of some of the excellent help available to them in the 'Look and Read' BBC television programmes now being shown.

The two 'Look and Read' programmes for slow readers of which I have experience are:

Bob and Carol Look for Treasure by Joy Thwaytes, autumn 1968, and Len and the River Mob by Roy Brown. Very successfully produced in spring of the same year. The latter programme is a much better presentation than the former, although both have much to offer the slow reader in a school remedial reading scheme. Both programmes break up an interesting adventure story into weekly serialized episodes where a search is involved. In one case, clues carefully read and followed, lead to a treasure which two children, Bob and Carol, find. In the other the hero, Len Tanner, who is also the teacher on the programme, has a series of adventures with a gang of thieves, and the police in the London Docks, where a stolen secret crate has to be located before the robbers are caught.

Both programmes are very suitable for boys and girls of a reading age approaching seven years up to about nine years. I would stress the point made in the teacher's pamphlets (very necessary for the programmes) that the subject matter is too mature for the infant réaders with difficulties, chiefly because infants who are perhaps of a chronological age of seven years, but who are struggling with reading, show an immature reading age much below seven years, probably five years or less; and although they may enjoy looking at the story, are

not capable of understanding much of the phonetic and word building work that is also part of the serialized portion.

The children for whom the programmes are most suitable are of six plus to nine years reading age, and, I find, have usually been under remedial care for one whole junior year, since leaving their infant departments, many of them even having had help in a small reading group in the last year of the infants also. They may have a chronological age ranging from eight plus to ten plus years. Strangely enough, they seem of a similar mental maturity and work well together. Immigrant children of the same chronological age, with some language difficulties, and therefore backward in reading, also benefit, as their vocabulary is enlarged and pronunciation corrected.

Definitely not for non-readers

Because the programme demands knowledge of letter sounds and ability to build simple words, and recognize a small number of Look and Say words, these programmes are definitely not for the non-reader, nor are they of any use unless they have had some training in these things on some reading scheme involving knowledge of short vowel sounds, all letter sounds and Look and Say material. With my group of twenty children, this ground had been covered by the infant teachers and by remedial work in both the top infant and the bottom junior class, for at least one year - involving about two or three half hour periods a week. With the younger ones the Janet and John reading scheme was used by the infant teachers, supplemented by the first two or three Racing to Read remedial readers, also the Griffin series, Books 1 and 2 about pirates, and Mike and Mandy Books 1 and 2 had been attempted. The Nixie Taverner Book II of Word Families involving the adding of 'e' to the five vowels to lengthen them, had been studied, and two card games of a 'snap' variety made for the children to recognize long and short vowel sounds in words, had been played frequently.

All this work proved a fine foundation for the two television programmes in question. Children who had been floundering over simple words, word building and Look and Say words, found the groundwork covered all over again in a very

interesting manner. I found it very important to carry out the phonic and Look and Say work suggested in the teacher's pamphlets for the following week, and in fact the programmes are pointless without doing so.

The children got most out of this aspect of the work if some of the phonic and word building was tackled before the actual programme viewing. This often involved playing games of Bingo and Snap, drawing pictures and collecting similar sounding words to put in 'a man's pocket', or as 'leaves on a tree', 'bricks in a wall', etc., all of which is very imaginatively drawn up for the teacher in the pamphlets. In fact, a normal teacher with a little imagination could easily use the TV programme and reader, as a basis for a project. 'Clues', involving reading simple sentences from the text, could appear in the children's project books. They could become grouped into teams of 'treasure hunters'. A real treasure hunt could be organized or, for the dockside story, groups become sections of the police force - i.e. River Police, Police Headquarters, Squad Car Group - all hunting for the thieves during their written work and discussion work periods and becoming personally involved.

Group work

This type of work lends itself well to small groups working together, or, best of all, small remedial groups, working one at a time with the teacher, so as to be able to anticipate the words and knowledge necessary to help solve the next part of the serial to be seen.

The Len Tanner series was excellent for this. Len, at the mercy of a gang of bad boys, appealed tremendously to the children. He asked the children to write to him. The children responded generously to their hero in trouble. The remedial room was promptly turned into a police station, every child was a police constable or sergeant, and at their own request lists of numbers issued by their names on a 'police notice board'; and from then on they couldn't wait to struggle to read the messages which kept appearing on it and had to be duly read and noted in their 'notebooks'. 'Man wanted' – 'Have you seen this man?' etc. 'Bank robbery', 'Dog lost', were all

notices that now appeared. With the help of their Look and Read Story Book, and the brighter ones among them, they would struggle to sort out what the words said, and how to write down wireless messages from Police Headquarters, and 'clues' which told them where to look for another clue leading to - a robber, lost dog, treasure, what you will. 'Look under the mat by the teacher's room', 'Look in a box outside the room' etc., were all fought out between them - I could usually hear the next chapter read by every one in turn one way and another, while this and written word building work was going on with a group, before the next television programme appeared.

While a lot of suggestions could, no doubt, be made to improve some of the actual methods of word building and general presentation of these programmes, the latter (Len Tanner) story in particular, shows that the BBC are alive to these shortcomings, for there is an improvement in technique. The BBC openly ask for ideas and criticisms from

viewing teachers, in their pamphlets.

Nevertheless, whatever the shortcomings, the following points are worth noting. The direct appeal of the hero-cumteacher character of Len, in the Len Tanner story, makes contact with the children quickly and their responses are very eager. The pace is slowed down in the presentation of words so they can be more easily assimilated and read. Word building processes use large letters, easily read by children whose focusing is immature and dodgy. Children's attention is focused on the left hand side of the word, and the words slowly revealed at their own pace of eye movement and rate of understanding. This is very helpful for the dyslexic type of child who tends to notice the wrong end of the word first, for children with poor eyesight struggling with glasses and focusing on print usually too small for them, and above all, the slapdash reader has to steady himself up, and concentrate on just what is revealed at the time, and this is good.

Planned repetition

Key vowels in words are emphasized where necessary, and words of more than one syllable such as: looking, himself, broken, shouted, upside down, are carefully attacked in sections and *built* as they should be. These are the type of words which in their entirety in one block, can intimidate this type of child, so that they usually just make a stab at the first letter and hurriedly guess at the rest, before their eyes jump wildly on to the next word.

Planned repetition of useful common and new words are spread throughout the story and viewing programmes and this enables most of the children to familiarize themselves with a wide vocabulary for future use.

An interesting point we discovered is that a few parents of some of these children who had been approached previously to 'take some interest' and 'hear your child read a page of his book each night', and who had obviously never bothered to try and help their child in this way before, were now looking in themselves to the programme as a serial, at home, and following it up with their children, discussion-wise, later. We even had one parent who used to contribute an occasional 'letter for Len Tanner' on her own account when he asked for letters to be sent to him c/o BBC Television Studios, which involved the children in simple sentences, words or pictures.

The children were eager to see if he would show their letters on television and intrigued by the interesting mechanical gadgets used to bring letters and words together for them to read aloud to him after viewing the serial. More parents of some of these children have shown themselves willing to lend a listening ear to an eager, if rather stumbling son or daughter, when they have the child showing a keenness to read.

The children themselves all benefited one way or another. Most important was their enthusiasm, which meant learning to read and struggling together with sounds and words was something now in the nature of an adventure with a purpose. That is, to find out 'what comes next in the story'. The programmes enabled some children to make a real breakthrough. Reading, they found, was not always a monotonous grind; it could give pleasure. They were prepared to try out unfamiliar words with newly learnt sounds, and they suddenly felt an urgency to learn what the *shape* of many new key words looked like, even if they couldn't read them phonically.

Their interest was aroused and they became personally involved in a story about which they could talk fluently, have personal ideas about and these ideas they were prepared to put down on paper. Most of them were ready and anxious to tackle new material of a similar nature and try new reading books on their own.

The ground covered by these programmes is fairly extensive, but 'spotty'; so I would feel there is need to have more time after the programme has finished to fill out and follow up the phonic work tackled. The teacher's pamphlets give good guidance here.

There is no doubt in my mind that this TV approach is a very useful tool for the remedial teacher, but it can only supplement and boost the work a child needs to do, with the teacher, for the majority of the remedial periods during the year. This is word building, phonics and oral reading. The enthusiasm and willingness which the teacher needs from the children, to stick to this 'bread and butter' work, has been aroused now, before the class work begins. The pupils have the confidence of discovering that they can tackle reading a good story, that they are not the failures they thought they might be, and particularly during the viewing time, they are happy, relaxed and cooperative, and so much better material to work with.

These TV programmes are well worth considering for a place in the reading scheme.

27 The use of comics in remedial teaching

Terry D. Johnson and R. Johnson

The question of the use of comics in the classrooms is frequently included in discussions of teaching material, particularly in relation to reading instruction. But the question raised is usually an either/or proposition. Discussants tend to produce global decisions, usually giving cautious and evasive approval. The question of which comics and how they might be used is rarely mentioned. Furthermore, the correspondents Sampson's (1969) questionnaire did not appear to be using comics at all. The untutored use of comics in the classroom usually results in a pile of tattered paper which represents a serious visual pollution problem. For good readers the benefit derived from reading them probably amounts to little more than educational thumb-sucking. Poor readers are provided with one more avenue along which they can exercise their already highly-developed skill of avoiding actually reading anything.

Let us address ourselves to the first of the questions posed above. England is fortunate in that there are few out and out objectionable comics such as are extant in the United States. However, teachers would be advised to evaluate comic strips before endorsing them as reading material. For some reason Look and Learn, otherwise an excellent production, seems to want young children to relive past wars and experiment with current possibilities through Clark's Commandos versus the 'Zekovians' (a nom de guerre that is about as concealing as 'an unnamed political power').

Comics aimed at the early juniors (Beezer, Dandy, Topper and Beano) usually avoid political battles but include much personal violence. What is more disturbing is the mockery frequently directed at children who are fat or who wear glasses, or at teachers and policemen. Teachers and policemen may be considered fair game but the obese or shortsighted child seems to be somewhat defenceless.

More acceptable to parents and teachers is a new generation of comics which include Once Upon a Time, Pippin, Bimbo. Bobo Bunny, Twinkle and Teddy Bear. These are aimed at vounger children, or more specifically, at the parents of vounger children. The content is usually unobjectionable and includes a high percentage of educational material. In this sense they are very old-fashioned. Like the improving literature of Sarah Trimmer and Thomas Day and the other early eighteenth-century writers, their primary aim is to make a better person of the reader. Entertainment of the child is only the sugar-coating on the pill. The art work and typeface are much superior to the Beezer, Dandy and Beano group but lack their vitality. For this reason we suspect that the Beano etc. are more popular, particularly with boys, than are the newer comics. Teachers will have to make their own decisions with regard to interest and the moral value of the content.

For older children Look and Learn has a similar educational motivation. Eagle and Robin probably represent the best balance between child and teacher-appeal.

Readability of comics

From the remedial teacher's point of view the most serious drawback of most comics is the discrepancy between interest level and readability level. In all the 'educational' comics the reading level is in excess of the interest level. This is particularly marked in the case of comics aimed at infants. It is obvious that these will have to be read to the child, and it is unlikely that many parents will in fact do so. In any case, if the parent is prepared to go to the trouble of reading aloud to the child there is already a wealth of much better material available in the form of books. The relatively high level of readability is unfortunate when combined with the large number of illustrations. It means that it is possible to get the drift of the plot from the illustrations alone. Thus the comic may encourage avoidance of the textual matter.

The situation with the 'bad' comics such as Beano, Dandy, Beezer, Topper, etc., is different. The age range of the appeal is much wider, ranging from kindergarten to secondary school.

Thus for many who are attracted to them these comics provide material that is in some ways ideal for the remedial teacher: very high interest level with a relatively low readability level.

The use of comics

Let us turn our attention to the use of comics in a remedial situation. For the child having difficulty with his reading, comics (a) present too much visual information and (b) frequently use a vocabulary beyond the child's current reading capabilities. How can the teacher exploit the unquestionable motivational value of these comics while avoiding their drawbacks? A procedure we have found extremely successful involves the production of 'books' by the pupil. The procedure is as follows:

- 1. The pupil selects a comic strip.
- 2. He numbers each individual picture in proper sequence.
- 3. He cuts out and pastes each picture in the top half of a blank sheet of paper.
- 4. He then dictates his understanding of the story to the teacher who prints the words below each picture, reading the words back and having the child do the same before moving on to the next picture.
- 5. The child secures the pages together, makes a cover and reads the story to anyone who will listen.

Comments on the steps involved in comic book production

- Step 1. The teacher must come to terms between the interests of the child and the values implicit in the material. If you think you can suggest a more suitable and equally acceptable alternative then do so. If Jimmy will only read detailed descriptions of World War III or IV then grit your teeth and hope for better things in the future.
- Step 2. Numbering the picture ensures the correct sequence will be maintained in piecing the story together after it has been cut out.
- Step 3. The cutting and pasting ensures that even the poorest reader can feel he is making a real contribution.
- Step 4. This stage is crucial. By using the child's verbal

productions the teacher ensures that all vocabulary used is within the child's understanding and that all the speech patterns are natural to the child's own dialect. The story dictated by the child does not have to be identical to the one intended by the artist. The teacher should accept the child's version.

During the dictation procedure the teacher should say each word aloud as she prints it. Wherever possible the teacher should get the child to supply as much information as possible. For example, if the child suggests the word 'light', the teacher may be able to get the child to provide the 'l' and the 't'. Where words in physical proximity have common elements such as the same initial consonant, blend, phonogram or suffix, the teacher should point out the similarities. Words that are likely to give particular difficulty in reading are put on individual flash cards and kept in a pocket in the back of the book. The child works with a partner in practising these words. If the child tends to 'run off at the mouth' the teacher should plead fatigue, inability to keep up, etc., and require or suggest a simpler summary statement.

As the child develops confidence and competence the teacher can print the child's story line lightly in pencil. The child then traces over the words with a felt pen. At a later stage the teacher prints the child's dictation on a separate piece of paper and the child then copies it into the book. At an even later stage the child writes his own story on a separate piece of paper, teacher and child correct it together, and then the child copies the corrected version into his book.

Step 5. The book represents a tangible and attainable goal which gives the child a purpose for the preceding work. There is rarely any problem in getting the child to read his productions. The problem lies in finding willing listeners.

The effectiveness of the procedure

While we have not yet submitted the method to a strictly experimental test we are convinced of its effectiveness. Individual children have progressed noticeably in reading after a few weeks of working with comics in the manner suggested. The advantage of using the child's own speech as reading

material is suggested in the number of children who produced and read books well in advance of their 'readers' that were giving them trouble. Their 'reading' was genuine in that the children could accurately identify the words out of context.

Use of serials

Extended motivation can be maintained by the use of serials. Children seem to be suckers for the cliffhanger technique and we have had children poised with scissors and paste in hand waiting for next week's issue. As the collected issues are formed into a set they become a prized possession, to be read and re-read. Indeed, we are rarely able to collect samples because their owners refuse to part with them.

Material

We are also convinced of the importance of the quality of the materials used. The child is provided with crisp white paper to write on. Whenever possible the paste is a rubber-based type that does not crinkle the paper as it dries. The child is allowed to use, as a special privilege, brightly-coloured felt-tipped marker pens. At all stages the child is encouraged to take pride in producing a well-finished product.

Work load

In its early stages the method is very demanding of teacher time. However, as the children reach the more independent stages (tracing and writing their own rough draft) the teacher can supervise the production of about ten books at any one time. We usually use 'comic production' as one of a number of group activities. Children are also allowed and encouraged to work on their books individually at free times during the day.

Technical considerations

Like many effective procedures the method is deceptively simple. The procedures described employ many of the qualities of a language experience approach: interpretation of pictures, talking, writing and listening integrated into a complex of communication skills (Ashton-Warner, 1963; Merritt, 1968). The child is actively involved in all stages of the produc-

tion (Plowden, 1966). The procedure also employs much that is good in the story method (Jagger, 1929), the impress method (Heckleman, 1962) and the kinesthetic method (Fernald, 1943). Our approach employs short-term, tangible and attainable goals. Above all, the method ensures a very close relationship between the teacher and the child.

References

ASHTON-WARNER, S. (1963) Teacher, Secker & Warburg.

CLAY, MARIE M. 'Reading errors and self-correction behaviour', Brit. J. Educ. Res., 39, 47-56.

FERNALD, G. M. (1943) Remedial Techniques in Basic School Subjects, McGraw-Hill.

GODDARD, NORA L. (1958) Reading in the Modern Infant School, University of London Press.

HECKLEMAN, R. G. (1962) A Neurological Impress Method of Reading Instruction, Mercred County Schools Office, California.

JAGGER, J. H. (1929) The Sentence Method of Teaching Reading, Grant Educational.

MERRITT, JOHN E. (1968) 'The linguistic approach to reading', in J. Downing and A. L. Brown, eds, The Third International Reading Symposium, Cassell.

PLOWDEN REPORT (1966) Children and Their Primary School: a report of the Central Advisory Council for Education, HMSO.

SAMPSON, O. C. (1969) 'Remedial education services report on an enquiry II: views and methods', Rem. Educ., 4, 61-5.

28 A local radio series for slow learning children

R. D. Valentine and D. R. K. Quayle

Use of local radio as an educational medium is a comparatively recent innovation. Local radio used as an aid in the education of slow learning children has not as far as we know been considered before. The advantage of the use of the local station lies in the value of enabling the writers to embrace environmental factors which are likely to be within the experience of children in the target population. This is particularly important when the needs of slow learning children are under consideration.

During 1970 a meeting was arranged between a working party set up in Sheffield to advise on Remedial Education and David Sheasby, Education Producer at B.B.C. Radio Sheffield. It was decided to prepare a series of broadcasts for slow learning children at the secondary school level. The local education authority, who were to meet the cost of producing pupils' booklets, cooperated fully, as did the staff of the teachers' centre, then situated at Carfield School, in duplicating and preparing the booklets for distribution. Teachers and children without their help the series would have been impossible to produce. The present writers undertook to devise and script the programmes, and to produce supplementary booklets.

It was decided to present eight programmes in the first series, to be broadcast during the spring and summer terms, 1971. Two of these broadcasts were to be devoted to children's work.

The aims of the series were to stimulate the interest and imagination of slow learners at the eleven to thirteen age range, with a view to encouraging them to produce meaningful written and practical work; and to form a basis for reading and discussion. It was found, in fact, that many junior schools also made use of the programmes.

Each programme was not intended for use as a single lesson, but as the basis of a central theme covering several lessons during a two week period. Each programme was repeated during the week after its initial broadcast. It should be emphasized that, as with all broadcast material, great importance was placed on introductory and follow-up work with the individual teacher. A teacher's pamphlet was provided setting out suggestions for activities and giving a brief historical background, where appropriate, to the stories which formed the core of the series, for although it was in no way intended as a history series close attention was paid to the authenticity of the historical data included.

The series was entitled 'Tales of Sheffield'. A further series is projected, and is now in process of preparation.

The use of local radio in itself provided a strong motivation to work, with the added incentive of the promise of hearing names mentioned 'over the air' in connection with work produced. Children whose work was submitted for broadcasting were given the opportunity of presenting their contributions personally. Visits were made by Mr Sheasby to schools in the area, so that the children being recorded would be more relaxed in familiar surroundings. Interest was further stimulated by using the local environment as a backcloth for the dramatized stories, which were chosen to appeal to the children for whom the series was designed.

Subjects selected for the first term were: the imprisonment of Mary, Queen of Scots in Sheffield, the plague at Eyam, and a modern adventure story set at Stoney Middleton focusing attention on safety in and concern for the countryside. The first programme was called 'The Ghost of the Manor', the second 'Ring-a-Ring o' Roses', and the third 'Lovers' Leap', a reference to the cliff which is a prominent feature of the village where the action takes place. These were followed by a first children's programme, 'All Your Own Work'. The second term's subjects included the story of gang warfare in the Sheffield of the 1920s and '30s, a tale concerned with present-day gangs of 'Mods' and 'Skinheads' set in Sheffield, and a story of the bombing of Sheffield during the second world war. The titles were 'The Little Chicago', 'Don't Let It Happen

Again', and 'The Blitz'. The series ended with the second 'All Your Own Work'.

Material was presented in dramatic form over the air, and as illustrated stories in the pupils' booklets. Effort was made, in both instances, to relate vocabulary to the capacity of the children. Again, the importance of the teacher must be recognized in assessing the extent to which verbal content might be outside the experience of his pupils, and it was assumed that attention would be paid to this aspect. Where it had been anticipated that any particular words would give rise to general difficulty, strong contextual clues were contrived. Repetition and other devices were used throughout as reinforcement. A word list was given at the back of the pupils' booklet, but was included, ostensibly, to help with written work and with solving the crossword puzzle which was a feature of each booklet. Maps, sketches and verse were also included to further the children's enjoyment and understanding of subject matter. The booklets were designed for reading and completion by the individual child. Illustrations were left as open as possible so that they could be added to and coloured in as personalized a way as possible.

It was intended that story content should receive consideration from two main angles. Firstly as an exciting story concerned with people, places and events set in familiar surroundings, and secondly as the conveyance for topics to raise questions in the children's minds extending beyond the actual story. It was anticipated that much of the follow-up work would be discussion and written work concerned with the more imaginative aspects of the stories, the moral and social issues raised, and the extraction of factual elements from fictional content. Opinion and imaginative work should embrace diverse creative activities.

Response to the series has exceeded expectation. Over fifty schools expressed the intention of following the programmes, including comprehensive, special and primary schools. Well over 2,000 booklets were supplied. Radio Sheffield estimate that there were about 1,890 regular listeners in secondary schools. Work produced and submitted for the feedback broadcasts included interviews, discussions, poetry, stories,

plays, music and song, puppetry and reports of visits. An old lady in Eyam was heard to remark that she thought the total school population of Sheffield had made a visit to the village during the weeks following the 'Ring-a-Ring o' Roses' broadcast.

It has not been the purpose of this article to try and assess the success or failure of the venture, but to present a description of an experiment designed to extend the range of aids which teachers in remedial education are always anxious to utilize.

> In Eyam, There is a stream, Where Emmott and Rowland were once seen. Emmott said 'No!'

She could not go Because the plague was spreading so.

Emmott died Rowland cried. Too late the plague it did subside.

Twelve-year-old

Comments

from a survey made by the Education Authority in conjunction with Radio Sheffield

Ashleigh: Enjoyed by children - created interest. Work books useful.

Gleadless Valley: Booklets excellent for remedial classes.

Yewlands: Excellent. Very useful and enjoyable. Extra material increased interest.

Herries: Popular with children, etc.

Carter Lodge: Excellent, well-aimed. Interest level well pitched.

Brook: Very useful.

Silverdale: Dramatic quality too unsophisticated for older

pupils!

City: Visits to places mentioned in the series have proved

valuable.

225

Firth Park: Children much more involved because of local setting.

Colley School: 'Tales of Sheffield'. An excellent idea in broadening pupils' interest in the local environment. Has already led to an outside visit with more planned. The opportunity for children to broadcast themselves is a wonderful stimulus for our work. I very much look forward to further programmes of this standard.

It has stimulated visits to Eyam for children who do not normally move very far out of Shiregreen. The fact that children hear themselves speaking can itself help staff to improve the children's speech.

Taped and used regularly. I cannot speak highly enough of this series. It has given the second year remedials something of their very own, which interests them (not so much in writing, but in talking, discussion and drama). The crossword and word list has given them an interest in words and spelling. Later we hope to visit the places mentioned.

Other remedials and first years have used the books for reading and discussion. Eminently suitable. Mr Sheasby has been to school and talked to the class, recording some of their comments. This is a vital link and makes the children feel really involved in the whole series.

Earl Marshal: I believe these series have been of great value. The subject matter, being local in interest, has held pupils' attention. We have submitted quite a lot of pupils' writing to Radio Sheffield, and this has been an added stimulus to the quality of work produced.

In response to 'Tales of Sheffield' a group of 'remedial' students wrote and acted a play which was recorded by David Sheasby for a later programme in the series.

I also found that the series was valuable in providing new, interesting material to read and talk about. The booklets were especially appreciated; it was good to find *large* print and pictures that could be coloured – the children were proud to put their names on them.

Remedial education in the school curriculum

The contributions in this section are subject based but none of the writers, it can confidently be asserted, would regard the curriculum as comprised of discrete units nor see themselves working in isolation from colleagues in an enclosed subject area. Indeed, those concerned with the educationally handicapped would find it easier than most teachers to subscribe to Hirst's view of the curriculum: programmes of activities designed so that pupils will attain, as far as possible, educational ends or objectives.

The curriculum of the educationally handicapped pupil at secondary level has been the subject of a Schools Council Curriculum Bulletin (no. 5: Teaching materials for disadvantaged pupils). It is not to be anticipated that a full-scale treatment of such issues could be gleaned from the pages of a journal; yet, of the four elements which are usually included in definitions of curriculum, objectives, course content, methods, evaluation, Section VIII is deficient only in the first and even here, not seriously deficient. This would seem to be a sufficient answer to those critics of remedial education who believe that the teachers are entirely preoccupied with reading in the narrowest sense.

The articles on science teaching (Hinson, 29 p.229; Nettleship, 30 p.235) are very encouraging. The authors demonstrate that less able pupils can have worthwhile experiences in the science laboratory. Bolwell and Lines (31 p.240), in an important article, call for an approach to learning which will develop skills valuable in adult life – identified as, basic skills, study skills and social skills.

Less able children (i.e. children in a school for the ESN) are

performing music and appreciating it at a high level (Higgs, 32 p.247). They certainly participate and enjoy reading and writing poetry (Gregory, 33 p.252). Perhaps in time we shall be able to say as much about mathematics; at least there is evidence that the work of Piaget is beginning to penetrate the classrooms; and, for those who are stuck fast in a computational bog, help is on hand through the punch card system devised by Cawley (34).

Materials and methods must be evaluated. Sometimes it will suffice to give a straightforward account of the materials and of what happened when they were used. On other occasions, more sophisticated procedures might be appropriate, in which case an excellent model has been made available by Simon and Ward (35 p.264).

29 Teaching science to slow learners in secondary schools

Michael Hinson

In this technological age, there can be no doubt of the vital role of science in the school curriculum. Within the last decade, science teaching methods have radically altered and improved. The wilting contents of the 'nature table' have faded into the background and from the infants' school onwards children are encouraged to explore basic scientific concepts, using simple apparatus comprised of everyday materials. For the older age groups there has been a movement away from the traditional lecture-demonstration technique, the various Nuffield schemes providing an impetus for a more empirical approach up to examination level.

With the trend towards unstreaming in primary schools and the increased stress on individual learning regimes, slower children are more likely to have an equal opportunity with their fellows to enjoy early scientific experiences. At the secondary level, however, the picture is less encouraging. Despite the present patterns of re-organization, the majority of children still transfer to secondary education at the age of eleven-plus. Many pupils are ill-prepared for the trauma of secondary transfer, as they exchange the security of a small school, where subject divisions are often blurred, for what initially may seem a confusing labyrinth. The degree of complexity of the timetable, with its inherent room changes, will depend on the extent of the subject divisions practised in a school. In more formal situations children will experience for the first time science taught as three separate disciplines - physics, chemistry and biology, probably by three separate individuals in three different laboratories, security and continuity being sacrificed for the convenience of a narrower approach to science.

Do all children think alike? The Schools Council Working Paper No. 1 (1965) warns that secondary teachers should take a good deal less of the learning process for granted than is often the case at present. Poor achievement in any subject is likely to be due to the interaction of many factors motivation, ability, suitability of the content of the course and pertinent teaching methods. Gulliford (1969) points out that the content and methods of teaching cannot be decided merely by considering what the teacher would like to achieve. He must also consider what pupils can best study in terms of the stage of development in their thinking. Jackson (1965) administered six of Inhelder's experiments to groups of children of both normal and subnormal intelligence. His findings indicate that wide variations in levels of logical thinking may exist among children of similar ages and that the ability to think at a certain logical level in one situation does not necessarily imply the ability to think at that level in other situations. Fifteen-year-old subjects of low intelligence achieved no higher levels of logical thinking than did eightvear-old pupils of average intelligence.

Many younger secondary pupils will be unable to pose a hypothesis satisfactorily and to examine facts systematically to see if they fit, since their logical thinking will be tied to the concrete aspects of a given situation. Those responsible for the welfare of slow learners in secondary schools will be acutely aware of this piece of developmental evidence. The crucial factor is to convince specialist subject teachers that this situation exists. In a school where the remedial department is responsible for the teaching of almost all academic subjects, this difficulty may not arise. On the other hand, some departments deal only with specific difficulties in English or mathematics, possibly on a withdrawal basis, and in this situation, a head of department should be in a position to advise other specialist teachers on suitable teaching approaches for less able pupils.

A science syllabus for slow learners

Designing a science syllabus for the slow learner has frequently provided something of a headache for science teachers. A diluted version of the 'A' stream approach is likely to prove unsuccessful, and the underlying psychological reasons for

this are not always understood. Yet science is as important as any other subject in the progressive widening of the horizons of a group of children whose outlook is often rather narrow. Many of them are interested in science and just as keen to do something. In order to maintain their self-esteem it is important that less able pupils are given opportunities equal to those offered to their brighter peers. Especially in streamed secondary schools, they soon become aware of their own shortcomings and will eventually resent being denied, solely because of their learning difficulties.

The vast range of scientific knowledge will require drastic pruning in order to produce a manageable course commensurate with the pupils' rate of progress, the general approach being both direct and concrete. It should be remembered that there is a common core of basic knowledge which is the same for all pupils whatever their ability. To quote from paragraph 440 of the Newsom Report (1963):

It would be comparatively easy to go through an interesting and useful course without dwelling on the great unifying concepts – the energy chain, evolution, the balance of nature, the simpler quantitative laws (perhaps understood pictorially) and the like. They may be beyond some pupils but those who have any chance of grasping them, even though apparently fleetingly, should have the opportunity.

Often, all pupils follow a common basic syllabus in their earlier years of secondary education. Teachers concerned with the slow learners, especially in their first year, will need to appraise a scheme in a critical fashion, 'stripping it to the bone', as it were, in order to determine the most important basic principles to be taught. The next stage is to design a carefully graded programme which will develop these concepts.

In order to exemplify this point a little, I include below part of a combined physics and chemistry course which I used two years ago. Due to the re-organization of a grammar school into a sixth form entry 11–18 comprehensive school, the science staff, at the time, was composed largely of grammar school

teachers unsure of how to tackle the problem of science for children in the first year remedial set. I agreed to teach the group and decided to choose the main topics from the Nuffield schemes, followed by the school, and to design a course around the subject of 'Water', also embodying the basic laboratory techniques which needed to be taught. Here is an extract:

Hot and cold water

1. Heating water in the lab. - the Bunsen burner.

Measuring temperatures – use of thermometer.
 Centigrade scale. Boiling point and freezing point.

3. Why does hot water rise? - Simple treatment of domestic hot water system. Why do we lag the hot water tank?

4. Water vapour, condensation – the rain cycle.

Solubility – soluble and insoluble substances. Dissolving, solutions and solutes. Saturated solutions – growing crystals. Study of crystals using handlenses and microscope. 'Crystals gardens'.

6. Filtration and evaporation - separation of a sand and

salt mixture.

Clean and dirty water

I. Construction of a simple filter.

2. Distillation - pure water from sea water . . .

A further section, entitled 'Floating and sinking', covered such topics as density and displacement. Simple hydrometers were manufactured from drinking straws and balls of plasticine and the story of Archimedes linked the science with history lessons.

The teaching 'atmosphere' in the laboratory

The teaching 'atmosphere' of a laboratory is very different to that of a general subjects classroom. Due to the hard, high benches, seating arrangements will be somewhat different. Surrounded as it is by complicated-looking apparatus, with a variety of taps-to-turn and switches-to-flick, a great deal can go wrong very quickly. With their characteristic dislike of change, less able pupils in such a novel situation might take longer to adapt to any form of laboratory routine. However, if a measure of progress in experimental work is to be achieved,

this routine must be patiently established, not least to minimize accidents and breakages. A teacher should have the necessary experience to know how to organize such a routine, at the same time having both the sympathy and patience to give his class expertise in their scientific work. It is hardly fair to expect a teacher in his first year or so of teaching to achieve this ideal. The children are likely to adapt more quickly if their science lessons are conducted by one teacher in one laboratory, equipped for general science. In the first year, four periods would seem to be the optimum to enable the science teacher to establish a relationship with his class.

A problem which science shares with other academic subjects is that of a specialized technical vocabulary which creates difficulties both in the reading of textbooks and the recording of results. It is necessary to teach the recognition of a basic vocabulary for each topic attempted by the class. So far very few science textbooks designed specifically for less able secondary pupils have been published, although the recent Inner Ring Science (Batten, 1971) deserves mention. The textbooks for the Nuffield scheme are well illustrated and there are numerous source books from which teachers can prepare work cards and other material. Despite the initial strenuous effort, modern reprographic techniques ensure that materials can be used more than once. Record keeping is an integral part of scientific method and with a variety of work-books and worksheets to file away, a loose-leaf folder will probably be the most serviceable. The periodic writing of notes under such simple headings as 'Things we used', 'What we did', 'What we saw', and 'What we found out' can provide a link with English teaching and contribute to an orderly approach to science.

Fortunately the modern trend in science teaching towards individual discovery through an empirical approach, favours the less able child, since his need for practical work is probably greater than that of the brighter child – nor is there any real evidence to support the view that he breaks more apparatus! Using 'grown-up' apparatus, children will accept relatively simple experiments – initially, even the lighting of a Bunsen burner will be heralded as quite an event. Since they are usually slower at perceiving connections and arriving at

generalizations, these children need a wider variety of experience in practical work and, where necessary, frequent repetition. As in other subjects, procedures need to be broken down into easily assimilated stages. Nevertheless, ample opportunity can be created for pupils to savour what Nunn (1951) terms 'the Spirit of Science' and to increase their own self-esteem by the successful solving of a problem through scientific method.

References

BATTEN, MIKE (1971) Inner Ring Science, Benn; (reviewed in Rem-Educ., 6.2).

GULLIFORD, R. (1969) Backmardness and Educational Failure, NFER. JACKSON, S. (1965) 'The growth of logical thinking in normal and subnormal children', Brit. J. Educ. Psychol., 35, 255-8.

Ministry of Education (1963) Half Our Future, Report of the Central Advisory Council for Education (Newsom Report), HMSO, pp.147-8.

NUNN, G. (1951) Handbook for Science Teachers in Secondary Modern Schools, Murray, pp.1-5.

SCIENCE MASTERS' ASSOCIATION (1953) Secondary Modern Science Teaching, Murray.

SCHOOLS COUNCIL (1965) Working Paper no. 1, Science for the Young School Leaver, HMSO.

SCHOOLS COUNCIL (1970) Working Paper no. 27, Cruss'd With Adversity, Evans-Methuen.

30 Teaching science to slow learners

John Nettleship

Science for the less able – a specialist job, but for which specialist, scientific or remedial? With science specialists and teaching space in short supply these pupils may be regarded as the least profitable investment and left to a non-scientist in an ordinary classroom. The possibilities of improvised science under a remedial specialist are quite considerable. But if resources permit, why should not a graduate scientist and fully equipped laboratories be deployed?

For eight years I had taught chemistry in grammar schools. At last, reorganization began and I volunteered to take one of our less able first forms for science, six periods in a forty-two period week. The class was quite small (20–25) with reading ages eight-plus to nine. I was already familiar with the Nuffield courses for the first two years of secondary science. (These have now been issued as a revised integrated course, Nuffield Combined Science.) As these courses are based on the children's own practical work it seemed best to be guided by the practical work suggested in these projects, and to see what depth of understanding the children could achieve.

'Our worm's having babies'

The children were capable of almost all of the practical work of these schemes. They handled the apparatus sensibly. Thermometers, clocks and direct reading balances were used quite effectively. Very few breakages occurred. Their powers of observation were as good as those of my 'grammar' pupils, and more authentic. For years I had decided what my pupils should observe, brainwashed them into observing it and made sure that they saw it all in forty weeks dead. My new pupils really did believe their eyes, 'Our worm's having babies,' they shouted. 'Nonsense they don't have babies,' I said. But sure enough a number of worms were casting off the last half-inch of their bodies. I hurried to the biology specialist (M.Sc.Zool.) thinking that here was a fact of life that I had missed out on, but he was equally mystified. I still don't know what the worms

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were doing but those children have their minds made up. Similarly, I have studied chemistry for twenty years, but have never given a thought to the *sounds* of reactions – until those 'less able' children heard them!

At first I was disturbed by a tendency to 'play' with the apparatus. I soon decided that this was a necessity for many of the children, and left activities as free as possible within the framework of the lesson. It seemed no use drilling a lad in 'density' when he was fully occupied in pouring water between various sized beakers.

Limitations

Numerical work and abstract principles were kept to a minimum. Thus no success was achieved with calculations on densities. A handful of children may have got the idea of a cubic centimetre as a standard sized piece of a substance, but the intensive experience in handling blocks of different substances, marking them out into centimetre squares, weighing, measuring liquids, floating things, was definitely valuable to all. Many of these children had missed these opportunities before or had not been capable of benefiting from them earlier.

Similarly there seemed little scope for chemical theory. Most pupils could tell me that magnesium and oxygen make magnesium oxide, carbon and oxygen make carbon oxide, etc., but only after much sweat and toil. The value of this work was the experience of using new apparatus, seeing the spectacular reactions and mustering courage to hold on to burning metal whilst it cracks glass by its heat. On reflection I see the invention of names for new substances to be a rather sophisticated theoretical exercise. Dissolving is a quite complex idea for most eleven-year-olds to master – to produce salt from sea water seemed a small miracle to these children.

The traditional written work (method, results, etc.) is best forgotten. They responded very well to practical worksheets. A typical one is shown here. Rock salt is the remains of a dried up sea, sand being the main impurity in the salt. The children would taste the rock, then decide what it was and where it came from. I would show them the procedure two or

three times over. They would do the experiment. The worksheet helped some pupils remember the procedure. They filled it in during or shortly after the experiment, usually with enthusiasm. Later we would go over the worksheet so that those who found it difficult could correct it. Thus the main purpose of the worksheets to me was to make each pupil think and to drive in key words – filter, dissolve, evaporate. Usually they would ask for a spare sheet and make a 'best' copy to keep in their files. I am sure that a high standard of presentation was important here – typed script, two colours, absolute clarity. Similarly they appreciated well-presented books, especially *Animals* magazine and the excellent Nuffield Biology textbooks.

Benefits

The benefits from this year of science were in my view mainly:

With the excellent facilities available, each child was involved in dozens of exciting new experiences – use of microscopes, stop watches, getting colours out of grass, Bunsen burners, burning magnesium in oxygen, cutting up worms, finding a developing chick in an egg. Unfortunately our Xenopus toads died before producing their large trans-

parent tadpoles.

2. They must have gained some insight into themselves and the world around them. Discussion sessions were frequent and they provided an endless barrage of questions and ideas (many of these quite haywire). It was an intriguing task to steer these conversations round to a reasonable conclusion. Their response to the Nuffield Biology 'Reproduction' section was very good – they pursued the matter sensibly for several weeks, until they had satisfied their own minds on the subject. This section began with reproduction in water animals and progressed through birds to people, and this gradual approach to human sexuality was backed up by much informal discussion with a number of adults in the school community.

Although some of the boys picked up a fair amount of technical 'know-how', most of the children did not seem very capable of absorbing knowledge of direct use to them in the future. It seemed that applications of science would be best left until the third or fourth form.

Relationships

The decision of greatest importance, however, was what relationship to expect between pupil and teacher. The old grammar school attitude was impossible. Retarded pupils are retarded in general personality as well as academically. I decided to treat them as a middle form in a junior school, and this seems to have worked quite well. I regard it as most important that the class spent most of its time with only three members of staff, who collaborated closely and were able to establish a close pastoral relationship with them. To give them two or three periods a week with many different teachers would have been asking for trouble. The non-teaching staff also established a friendly and helpful relationship with these pupils.

In the absence of an enthusiastic scientist the following suggestions may be helpful:

- 1. A laboratory being available, a courageous non-scientist may embark on a similar course. The teacher guides for the Nuffield Combined Science are so packed with detailed teaching advice and background information that one could 'hardly go wrong'. Unfortunately, considerable accidental damage is likely when a teacher starts remedial science without prior experience of practical work.
- 2. Without laboratory provision the teacher could follow the Nuffield Junior Science approach (for nine to thirteen age group). The main publication here is a volume of 'case histories' in which the teacher and class picked up some theme of interest in their environment and followed it through as a project. One might for instance dig up clay from the school field and investigate its possibilities for horticulture, making pots and bricks, etc. I think this demands a very gifted teacher.
- 3. Remedial classes could be abolished by total unstreaming. This would be much fairer in giving the less able their share of science and the science specialists their share of the less able, but it raises formidable problems of class manage-

ment – if one tries 'class teaching' one has to rule out catering for one end or the other of the ability range. Should the able children follow individualized learning whilst the teacher spends the lesson time with those who cannot follow printed worksheets? Should able and less able children be forced into partnership for practical science work? The present school withdraws 20 per cent from its 'unstreamed' science sets. Even so the range of ability is distressingly wide. By the middle of the second year individualized learning seems essential.

The grammar school teacher has been preoccupied with his subject. With less able children the teacher must be preoccupied with the child. Primarily every lesson must aim at the personal development of the slow child, the subject acting merely as a vehicle for this. If a good learning situation is not available in a subject it is best to drop it. If laboratories and materials are not available, or if the teacher feels incompetent in science, science as such is best left untaught.

Salt From Rock Salt
What colour was the rock?
How did you know it had salt in?
What was in it besides salt?
Why did you crush it up?
Next you added water. What did the salt do?
Then you filtered it - what was left in the filter
paper?
The clear water which came through the filter
paper had thein it .
You heated the salty water and the water
into the air.
Pure salt was left in the dish

31 The place of environmental studies in remedial work with older pupils

L. H. Bolwell and C. J. Lines

Readers of the educational press are being made increasingly aware of radical criticism of our school system as it now exists. At the very time at which we in England and Wales celebrated the first hundred years of compulsory elementary education the whole framework was attacked by those who have been labelled 'de-schoolers'. The de-schoolers involved in the Parkway education experiment in Philadelphia claim that while schools are supposed to prepare young people for life in the community, in fact they isolate and alienate their students from the community in which they live. Similar sentiments were voiced by Dr J. E. Collins (1972) in this journal when he criticized our school system on the grounds that 'it is at variance with evolutionary change, for it is a prison maintained to contain rather than nurture the human young. It places a considerable group of pupils in an environment which is engineered to cause their failure' (p.9). As a result, secondary school pupils who are failures in terms of the traditional examination oriented work in school leave school unprepared for any kind of useful role in society. The ineffectiveness of the curriculum for many school leavers is reflected in absenteeism, in their alienation from the school environment and their anti-social behaviourism out of school. Many who do not share the radical 'de-schooling' outlook agree that it is time for a fundamental and positive reappraisal of the school curriculum.

This dissatisfaction has developed at a time when the schools have been undergoing basic reorganization. Reorganization has created a situation in which teachers who hitherto had no experience of work with academically less able children have now been placed in posts in which they may be responsible not only for the traditional work of the school which is geared to external examinations but also for the design of new courses

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for the less able and organization of the teaching of this work. The children themselves are expected to adapt to larger, more complex institutions which are very different from the schools in which they spent their early years. The reorganization of the educational system at both school and higher education levels has inevitably revived the 'more means worse' controversy and this in turn has highlighted the need for teachers trained to reorganize and provide for learning difficulties. These problems are in fact being detected at all levels of education. A recent newspaper article, for example, publicized evidence of reading difficulties of students at Edinburgh University. The article included the statement that 'until recently there has been a tendency to assume that people who have reached university possess basic literary skills commensurate with their general ability' (Kerr, 1973). Two-thirds of the students questioned however complained of spelling difficulties and even more of general problems connected with the presentation of written work.

It was obvious that most of the students had no command of flexible or systematic techniques for studying a chapter or paper. It was also clear that they found it hard to assess the value of a chapter or paper quickly by skimming through it, or to extract the main ideas and take helpful summary notes.

Clearly the difficulties encountered were the results of lack of basic skills and it is in the skill area rather than in the traditional emphasis on the bodies of knowledge incorporated in the standard school subjects that we must seek new approaches to learning and reading.

Successful teachers of slow learners have long recognized that the traditional subject approach is inappropriate for children with whom they are concerned. Sylvia Blackburn's (1972, p.11) statement, 'when children leave school they should be occupationally, personally and socially adequate', reinforces the argument that a more suitable approach to learning would be one which is concerned with the aim of developing skills which will be of value in the adult life. These skills have been identified elsewhere (Martin, 1972) as 'basic skills' which

are of general value particularly basic numeracy and literacy; 'study skills' which are more specifically related to individual disciplines as, for example, the ability to read a large-scale Ordnance Survey map in geography; and social skills. One may ask what justification we may offer for this? The first is the obvious fact that the slow learners will have only limited success in work aimed at the acquisition of knowledge which is then to be tested by conventional examination techniques. An even more important reason, however, is that in this rapidly changing world it is educationally more important to attempt to help all students to develop ways of tackling problems which they will meet as adults than to concern ourselves with the basic core of facts of traditional subjects which are likely to be out of date before the children leave school. There is certainly a strong case for asking that slow learners should not be expected to follow watered-down standard academic work for such work is neither relevant to their existing needs nor to their future expectations. In place of orthodox work in geography, history and science we would advocate the development of environmental studies. The implications of this recommendation are that with less able children we must be concerned with using the environment rather than teaching about the environment. The local environment should no longer be regarded as a common base for work in local history, local geography or practical natural science but as the stimulus from which a great variety of work will develop. Although the core of work in environmental studies involves mainly the skills and concepts of geography, history and science, valuable work in other areas such as language and art will develop naturally when an interdisciplinary approach is used. We would define environmental studies as a means of using the world with which children are familiar as a basis for the development of concepts, attitudes and skills which will be of use in any learning situation. We would further argue that in the environment of every child there is suitable material which can be used to provide a sound and exciting basis for learning through experience and personal activities (Lines and Bolwell, 1971).

Some of the chief advantages we would claim for this

approach are:

1. It provides a means of motivation for all kinds of work. The children observe for themselves and record their observations or express their opinions in a variety of ways. The recording of single observations made in the field provides excellent opportunities for work in mathematics as well as in reading and writing, yet the least able are not committed to unsuccessful and disheartening attempts to write methodical reports or lengthy computations, for recording may be oral (with the use of a tape recorder), visual (photographs), three-dimensional, or any combination of a variety of techniques which they have decided upon with the teachers' guidance. An absorbing practical project on the street, village or town which the child knows creates strong desires to express their knowledge and opinions in one form or another which provides opportunities for practising basic skills and, at times, certain elementary study skills. Research has shown that one of the prerequisites fundamental to the development of reading skills is oral communication and an adequate vocabulary. Teachers can lay the foundations for future work in reading by encouraging children to ask questions and talk about their own experiences in studying their local environment.

2. This work is relevant to the children themselves and their life outside school. Many secondary school teachers of remedial classes complain of the lack of suitable material upon which they can base their work. They point out that many interesting books have too high a reading level while others are pitched at the right level but are unacceptable to the class because of childish illustrations. In environmental studies this ceases to be a major problem since the material upon which class projects are based is collected by the class itself although supplementary sources need to be vetted carefully and processed by the teacher before being presented to the class for use (Bolwell and Lines, 1972).

3. Work on the local environment, though non-vocational in character, will help children become more aware of the job opportunities existing in their home area and the nature of the work being done in different local factories. Because

environmental studies is outward looking and project based it also provides opportunities for people involved in local industries to be invited to school to contribute to the development of the project and so creates yet another school-work bridge for the class.

4. Environmental studies can play an important part in the development of social skills by less able children. Some of the children are only too conscious of their below average level of competence and this makes them unwilling to make contact with other people. The locally based project, because it is related to their own experience and knowledge, provides a more secure base for the initiation of such contacts. It is easy however to place too great a demand on the children. In our first attempts at working with a remedial class in a village one fourteen-year-old girl came rushing back to us greatly embarrassed because she had become completely tongue-tied when faced by a stranger from whom she was seeking information. Role play exercises and pilot interviews in the classroom before an investigation or survey begins is one way in which the teacher can attempt to avoid this particular pitfall.

5. For children in the lower forms of secondary schools, environmental studies is invaluable because it helps provide an effective means of transition from the primary to the secondary school. More and more children are moving from an integrated or partly integrated curriculum at primary level, often from a small school in which they were accustomed to a substantial amount of work organized on a group basis, to a larger complex comprehensive school. The less able naturally find adjustment to this change more difficult than others and many of them are faced at the same time with the demands of a range of new subjects. Environmental studies can provide the continuity in approach which, in turn, will give the children security and enable

them to cope with the transition to subject teaching later on. 6. Environmental studies makes the children more aware of their own surroundings and should encourage them to be more concerned about their own environment. Projects can be developed in which children realize more fully the

need to preserve what is worthwhile and in which they can explore in an elementary manner the ways in which local planning problems may affect their lives.

Many teachers of remedial classes will say 'we are already doing this'. Environmental studies is not new but in recent years it has evolved a more systematic and purposeful framework which is related, in part, to social and economic change.

The stimuli to be found in any locality should generate worthwhile projects related to the needs and interests of the children rather than provide the basis for the teaching of traditional subjects through local examples. In this interdisciplinary approach the teacher's role becomes that of stage manager and not of principal actor. Ideally, environmental studies should be taught by a team of teachers who bring to each study their own special skills and interests.

It also involves the gradual accumulation by the teacher of suitable local source material and resources for learning. The newly established teachers' centres have an important part to play in organizing workshop courses and in providing reprographic facilities to help schools which are experimenting in environmental studies. The success of the approach, as always, will depend upon the ability and professional judgment of teachers who, faced with classes of less able children who apparently lack motivation, will use the environment selectively as a rich source of stimuli for work in all areas of the curriculum. The development of this approach should help to obviate the criticism that we as teachers are failing to prepare young people for life in the community.

References

BLACKBURN, SYLVIA (1972) 'Westfield Comprehensive School: The

Slow Learner Department', Rem. Ed., 7.3, 1972, 11-13. BOLWELL, L. H. and LINES, C. J. (1972) 'Resources for local studies in primary and middle schools: An in-service experiment', Teaching

History, Nov. 1972, pp.320-6. COLLINS, J. E. (1972) 'The remedial education hoax', Rem. Educ., 7.3,

KERR, JOHN (1973) 'Reading problem at university', The Guardian,

LINES, C. J. and BOLWELL, L. H. (1971) Teaching Environmental Studies in the Primary and Middle School, Ginn, pp.24-5.

Remedial education: programmes and progress

MARTIN, G. C. (1972) 'An exploration of objectives and approaches in environmental education', in *Objectives and Approaches in Environmental Education*, Occasional paper no. 7, Society for Environmental Education, 1972.

32 The musical potential of less able children Geoffrey Higgs

'We had no idea they were so good at music!' This comment is frequently made by visitors to our day special school for educationally sub-normal children. How good though are these ESN children (IQ range 50–75) compared to children of similar ages? Certainly at our special school we enjoy full participation in the singing at Assembly, as well as a creditable level of achievement from the choir. Any child is welcome to join in choral work and every pupil without exception participates joyfully in the percussion work. A wide range of instruments, both recognized and improvised, are available in the percussion section.

To obtain some scientific measure of their basic musical abilities a series of tests were given. The most obvious test to employ for this purpose was the *Measures of Musical Talents*, by C. E. Seashore (1939). These are recorded on a 12 inch LP record. They begin with fifty items which measure the subject's discrimination of pitch. Fifty items measure discrimination of loudness; then thirty items test the sense of rhythm. The sense of time is tested with a further fifty items; this is followed by a test of timbre discrimination: finally thirty items test the tonal memory of the subject.

Six abilities

Seashore argues convincingly that these six abilities are fundamental to musical ability as a whole but that they must be tested separately. The results in all six tests can then be carefully considered in assessing potential musical ability as well as in discovering the specific constellation of abilities making up his or her musicianship. This test has been very carefully constructed over a long period of years. Research has shown that the results obtained are reliable and the validity of the tests has been demonstrated by the appropriate statistical analysis by McLeish (1950). Seashore's claim that it is musical

potential which is being tested and not intelligence has been substantiated by this research.

In view of the children's response to the school music programme described earlier, we anticipated that high scores would be obtained by our ESN pupils. As testing began it became evident that the speed of presentation of the test items was much too fast for the children to record their responses with confidence. A tape recording was therefore made: with the use of the temporary stop button a correct record of the children's responses was ensured. Instead of testing a whole class simultaneously, as with more able children, the testing was done in pairs or with groups of four children. It proved impracticable to complete the entire test in one session. For an adult it would be a full forty-five minutes of intense concentration. With these children it proved best to take one complete section of the test at a time, e.g. fifty pitch items and so on.

The ages of the children ranged from eight to fifteen years. Some were regarded by their teachers as fairly good musicians. For example one girl could play the piano sufficiently well to accompany the school recorder group. Others were known to be poor singers or instrumentalists although they still performed with enthusiasm. In all, twenty-five children completed the test. Their scores in the tests were compared with the standard norms. Every child scored below the average indicating low potential musical ability.

To check this finding and to obtain a clearer picture it was decided to compare the level of attainment of the ESN children with that of other children. So a class in a local secondary modern school was tested and another in a primary school. This proved both worthwhile and interesting. Both primary and secondary children proved to have higher potential musical ability than the ESN group. Very little of this potential was being utilized or developed in their schools, only a few of the primary school children were receiving private music lessons outside school.

Looking more closely at the test results we observed that in some of the tests, notably in pitch discrimination, the highest average score was made by the ESN children. Their

ability in loudness discrimination was at a similar level to the other groups. It was in tonal memory, in time, and in the rhythm test especially that the ESN scores were considerably lower than the other two groups. To provide some verification of these results the same groups of children were tested with Dr H. Wing's 'Test of musical intelligence'. This is also a battery of tests like the Seashore test except that a piano is used and the test is recorded on tape. Seashore's tests are based on the use of a scientifically controlled oscillator where only a single dimension is altered on each test. There are seven subtests in Wing's battery: Chord analysis, Pitch discrimination, Memory, the Sense of rhythm, Harmony, Intensity and Phrasing. Using the scores of the three groups of children on the battery as a whole, individual musical quotients were calculated. Once again all the ESN children scored below average, the primary group was clearly superior to both ESN and secondary groups.

Bentley's test of musical ability

These tests (Wing and Seashore) were designed for children and also adults. So, when a new test of musical ability specifically designed for children only, appeared on the market -Bentley's Test of Musical ability in children - it was used to make a final comparison between the three groups.

Dr Bentley has succeeded in reducing the measurement of musical ability to four subtests. There are twenty items of pitch discrimination followed by ten items of memory for tunes, twenty items of chord analysis (recognizing the number of notes played) and finally ten items to test the sense of rhythm. This means that it all fits comfortably on to a 10 inch LP record and the entire test can be completed within thirty minutes. This is a great advantage as a complete class can be tested during a single lesson.

A pipe organ and an electric oscillator are used to record the items. Instructions are clearly announced on the record itself and a sufficient explanation given. This test has obvious practical advantages, so much so that the children were able to complete it from the original recording without difficulty. Bentley's test does not demand such a prolonged period of

concentration and ample time is given for recording responses on the answer sheet.

The question to be asked at this stage was: Would this reduction in the number of items and the omission of certain aspects of musical ability thought fundamental by Seashore, still give comparable results with the three groups? Analysis of the results revealed an essentially similar pattern of results to those provided by the other tests.

Given the most favourable conditions, with a test they could complete happily, the ESN children still showed good basic hearing ability. But with the more complex abilities of memory for tunes, awareness of the number of notes in a chord, or discrimination of groups of notes in particular rhythms (vital attributes of musical ability) the ESN children's scores fell appreciably. In the final analysis of all twenty-five subjects, their musical potential as measured by these tests was below the general average of the whole group of 105 children tested.

Perhaps the best way to interpret the results of this investigation is to record the fact that the ESN children with a relatively poor potential are performing music and appreciating it at a high level. We should encourage and recognize their efforts even more than at present. At the same time we must realize that in secondary modern and particularly in primary schools there appears to be a wealth of musical talent, which for the most part lies unrecognized and undeveloped.

Table 32.1. Average scores (Maximum possible scores in brackets)

Group	No.	Seashore battery (260)	Wing battery (136)	Bentley test (60)
 ESN children Secondary modern Primary group 	25	134·36	47·04	25 · 64
	30	156·70	49·30	28 · 56
	50	184·00	59·30	36 · 38

References

McLEISH, J. and HIGGS, G. (1967) An Inquiry into the Musical Capacities of ESN Children, Cambridge Institute of Education, Occasional Research Papers 1.

BENTLEY, A. (1966) Musical Ability in Children and its Measurement,

Наггар.

McLEISH, J. (1950) 'The validation of Seashore's measures of musical talents by factorial analysis', Brut. J. statist. Psychol. 3, 129-40.

SEASHORE, C. E. (1938) The Psychology of Music, McGraw-Hill.

SEASHORE, C. E. (1939) Measures of Musical Talents, RCA Victor Division, Camden, NJ.

WING, H. D. (1947) Standardised Tests of Musical Intelligence, Sheffield version (privately issued).

33 Poetry in remedial classes

John Gregory

I would think it axiomatic that we teach poetry at any level for at least two reasons: to pass on to our pupils their cultural inheritance, and because it is pleasant and gives pleasure. The second reason may not be quite distinct from the first, and if we were to analyse it more carefully we would probably find that part of the pleasure it gives is due to the strengthening effect it has upon our emotions, and it is this effect that makes this, and the other arts, particularly useful allies in remedial teaching, in the development of that all-important relationship between teacher and pupil without which nothing happens.

Before we can say how poetry can help in the development of a relationship in remedial teaching, we need to understand as far as we can, what the relationships are that are lacking for a particular child, and what have been the results upon the child. The experienced teacher will have no difficulty in recognizing the results: to the experienced eye, vocabulary, all be signs that would form part of any unconscious diagnosis. There are of course, all the objective tests that we may use to what are the differences, then, that the 'lack of background' at primary level produces amongst the children?

Firstly, there is the simple difference that books, upon which many schools sometimes place considerable importance, are just not as familiar as objects, to some children as to others. Not only the child's vocabulary is limited but the number and variety of his speech rhythms too, and this, it seems to me is far more important at this age than the meanings of individual words. One has only to listen to children playing at anything, or father being used in the play. It is equally easy to distinguish, although it requires a longer period of listening,

those children who have not been introduced to other speech rhythms through stories, fairy tales and rhymes. Secondly, there is the effect that very often the speech rhythms and the vocabulary of the teacher will be quite removed from those of the child and that the child may never come to terms with the rhythms and tones of his teachers.

As an example of the sort of thing that I mean here, I want to quote a rhyme which has always been well known to children and which I heard recited in a primary school classroom two or three years ago, in response to a request from the teacher to the class for someone to recite any poem that they could remember. A seven-year-old girl got up and said:

'One, two, three,
Mother caught a flea.
Put it in the tea-pot
To make a cup of tea;
Flea got stuck,
We couldn't pour it out,
So along came a copper
With his shirt hanging out.'

This girl suffered the fate of many pupils before and after her. She was told in no uncertain terms that this 'wasn't a very nice poem, and not the sort of thing one said in class'. Yet there is, of course, an obvious link to be made here. Privately, as adults, we may not think very much of the piece above as poetry; the point is, however, not what we think, but what the child has been impressed by, and how, if at all, is it possible to build upon any pleasure that the child has had from the rhyme. There is, for instance, a delightful song which is also known to many children and which has recently been broadcast on schools television, which goes:

Little fly upon the wall,
Ain't you got no clothes at all?
Ain't you got no shimmy-shirt?
Ain't you got no petty-skirt?
Don't you never brush your 'air?

It ain't cause you got no 'air! It's because your Ma don't care! Poor fly!

I would not think it extravagant to claim that the child who liked, sufficiently to learn by heart, the first rhyme about the flea in the teapot would also like the second one and what is more would enjoy learning to sing it. A basic sense of rhythm and the folklore of children are two things that I would always aim to make contact with in the teaching of poetry at any level, whether at primary, secondary, remedial, or in the sixth form. The 'folklore', the child's own set of values, if you like, will of course be different at the different stages I have mentioned, but the lines of approach will be the same.

Now is the time for some practical examples of the kind of

work that I mean.

Firstly, an example of a verse by a six-year-old child which contains some of the things that I would praise in the work of almost any age group:

Kitty-cat, kitty-cat, Lying on the mitty-mat. You are fitty-fat, Fitty-fat, fitty-fat.

This piece was not written out but was told to me by a child who said that she 'Had just thought of a poem'. I wrote out the poem as she dictated it. It is a most sophisticated poem for 'balance' of the poem is precise and shows that this particular child will in all probability develop, fairly easily, a good it shows an observation of and some pleasure in the relation-

As an example of the sort of work that I have undertaken in twelve-year-old remedial classes, I would like to quote the following poem, 'Granny and Grandfather Griptometoe' (Gregory, 1969)¹, which was designed, together with other

^{1.} From 'The Tinker and the Cobbler', to be published by Pergamon

poems, to provide a basis for work in remedial language teaching through rhythm and sound, poetry and drama, music and movement. This particular piece, together with several others, was intended to be part of a series of lessons which would be aimed at those two things that I have already mentioned as being common to most children – their sense of rhythm and their folklore. The children, in these verses, are being asked to make sounds and noises as part of the poem.

Granny and Grandfather Griptometoe

Granny and Grandfather Griptometoe
Sit late in the night while their lamp burns low;
She with her knitting and he with his wine,
And the slow-ticking clock to keep them in time.
Her needles they click, his bottles they pop,
Click! Pop! Click! Pop!
To the tick of the clock.

She's knitting long socks for old Griptometoe
To marm his thin legs in the cold, slushy snom;
He's drinking her health in the lamp's lom shine,
And 'Pop!' goes another elderflower mine . . .
Her needles they click, his bottles they pop,
Click! Pop! Click! Pop!
To the tick of the clock.

He'll put down his glass and he'll rub his bald head,
She'll roll up her knitting and go softly to bed,
Then he'll pick up his glass for the very last time
And 'Pop!' goes another elderflower wine.
And their lamp will go out, but their clock will not stop.
Click! Pop!, it goes on, Click! Pop!
Click! Pop! Click! Pop!

Click! Pop! ... (ad infinitum, getting softer).

The noises are sometimes made with their mouths and sometimes with objects that can be easily obtained. That children enjoy making noises needs no demonstration. Perhaps we can remember from our own childhood, the sense of achievement that came when we first learned to whistle or when, fingers in mouths, we made the first shrill blast that echoed most satisfyingly over a long distance. It is only a short step from enjoying the comic possibilities of the sound made by drawing in air through compressed lips, to appreciating both sound and sense of:

'Dirty British coaster with a salt-caked smoke stack/Butting through the Channel in the mad March days . . .', and it is only one short step further after this to a major change in both reading and writing skills.

In the above poem, the noises made by the children are made with fingers being 'snapped' for the word 'Click!' and either air drawn through compressed lips, or a finger inserted in the corner of the mouth and withdrawn for the word 'Pop!'.

This poem is capable of a variety of treatments in a classroom. It is possible to divide the class into 'Clickers' and 'Poppers' - some may be better at clicking than at popping. The teacher, I have found, may need to act as a 'conductor' in the early stages but this stage soon passes. It may sometimes be valuable for the children to hear their own performance on a tape-recorder, but methods of development and ideas will suggest themselves to individual teachers. I have used Moussorgsky's Pictures from an Exhibition with this particular poem, and Walter De La Mare's Tillie. From Pictures from an Exhibition I took Il Veccio Castello and asked the children to clap the rhythm of the introductory bars softly throughout the playing of the piece. With Tillie - chosen because it followed the ideas of old age and also because of its sound and brevity - I asked the class to work in pairs: one to read a copy of the poem and the other to use a glove-puppet to mime the poem behind the upturned lid of a desk. They would then change roles, and all would have an opportunity for performing either this poem or another before the whole class. We also had Il Veccio Castello played softly behind the reading and the miming of the glove puppet. The merits of glove puppets in remedial work are well known. Their effectiveness has always impressed me as a form of sympathetic magic; the child who is normally too shy and diffident to say a word in front of the class, or perhaps even to his neighbour, can very often forget, when he is hidden behind a desk and assuming the character of the puppet on his hand, his nervousness

and self-consciousness which can sometimes be at the root of his inability to communicate at any level in any medium. Through this kind of pattern, repeated frequently, and with excursions whenever possible into written work and reading as *concomitants* of doing a job together, it is possible to use the rhythms of poetry and its emotional impact, to help the child over those difficulties that very often lie at the root of backwardness in the basic subjects.

Finally, I want to stress a point made earlier in this article. These ideas do not seem to me to be appropriate only to the field of remedial teaching, though it is here that one can very often see their usefulness most clearly, for at secondary level there is a willingness to allow controlled experiment in this area of the school curriculum not found in other areas, and also there are a far greater number of objective tests to help establish validity. The same approach is still possible, however, at other levels. It does the sixth former, or, indeed most of us, no harm to listen to the rhythms and patterns of Vachel Lindsay, Edith Sitwell, or other poets or musicians for:

'Nought so stockish, hard and full of rage, But music, for the time, doth change his nature'.

My own experiences give me more sympathy with this statement of Lorenzo's than with Cleopatra's, who, when the music is summoned for her, says 'Let it alone. Let's to billiards...'

Reference

GREGORY, JOHN (1969) from The Tinker and the Cobbler, Pergamon Press.

34 Diagnosing difficulties in number

Norman Cawley

Most people concerned with teaching maths have seen - and possibly kept - the sort of class record in which carefully cross-ruled columns itemize each child's abilities under headings such as, say:

t.u.	h.t.u.	money
+ > -	+ - x ÷	+ - × ÷
		,/

Perhaps some of you still do keep them, while others may feel quite critical about what you see as a preoccupation with narrow computational drill.

The tight little columns can make easy targets for attack. Even in their heyday most teachers realized the limitations. A child answered the key questions, got his tick in the appropriate square, but could then two days, or even two questions, later get a similar item wrong. When it came to problems the inconsistency was far worse. To tick or not to tick certainly was the question.

Another point of criticism concerns the relevance of this type of arithmetic. If a question is set out as:

Most children can manage it. However set it out as: 199 + 1

and far more mistakes appear, and if we ask the children to write down the number of the next, say, raffle ticket after



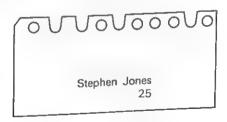
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no one is surprised by 1910 - 'a hundred and ninety ten'. The same child who can give the rote answer and verbal accompaniment about carrying figures in (a), the straightforward sum, nevertheless still does not understand notation principles well enough to answer (c). Yet which is the most important skill in a world where judgments are made around records at £1.99 or forecourt 'bangers' at £195?

However, attacking one form of structure puts me under an obligation to suggest an alternative. A structure is certainly necessary, if only to draw attention to the child who is not at the 'survival' level in his understanding of mathematical principles, as he merges into the vertical group, open-plan setting, theme teaching, or the integrated curriculum - all desirable changes but with more undergrowth for the failing child to disappear amongst.

In a previous article, I suggested that global scores, even on a good maths test, are not much help. There are simply too many possible areas of failure. What we want is to know quickly of a group of children, who need remedial help in crucial areas so that they can be given specific attention. Everyone these days is said to need a gimmick. So here comes mine. It is simply the use of punch cards for this sort of remedial record, wherever, at least, the size of the group justifies it.

For those not familiar with them, a punch card looks rather like this:



It starts out with a row of neat holes along the top. Like the tick/not tick situation outlined earlier it can only cope with a two state, yes/no situation. Whenever the answer is yes the hole is cut out into a slot. The cards are separated by the use of a knitting needle placed through an appropriate slot -

'no' cards coming up with the needle while the 'yes', slotted, card falls back.

So with our number record punch cards we might decide that hole number 3 is to cover understanding of place value. A quick screening test is given to the entire group and, where the children get the place value questions right, a slot is cut out above hole number 3. Now, when we want a small group who need specific remedial work on place value, in goes the needle to hole 3 and out come just the cards bearing the names of those children who need the help, explanations and work with Dienes MAB, counters, abaci, hand tallies, or what have you. The rest of the class, whose cards have fallen back, are given something appropriate to their abilities.

As a child grasps the general principle and can answer the screening questions so too is the slot cut out and only the small group with resistant difficulties remain. The system has the advantage over sets and streams that the remedial groups vary from topic to topic, so the same children are not failures week by week, hardening attitudes, and that children at any level of ability can have gaps and weaknesses in basic areas put right. This need for remedial work on special problems with brighter children is among points made by Mrs J. M. Moody of Haverhill Secondary Modern School.

But cutting slots in a card is really only another way of putting ticks in a column, its sole advantage being the fast identification of individual weaknesses. The two criticisms mentioned earlier, inconsistency and irrelevance, have to be met in other ways. Inconsistency was the product of teaching beyond the child's understanding. If the columns on the card record information about understanding the inconsistency disappears. Irrelevancy is the harder question and the one on which I had hoped for more general comment. We are none of us in the position of adult slow learners but we must all have some intuitions about the concepts, skills and rote facts which are basic to everyday life. I repeat the questions I asked in a previous article:

What concepts and what symbols do you think need to be understood by the less able? What specific number facts (bonds, tables, relationships between units, etc.) need to be instantly recalled? What computational techniques are needed?

This raises a point made by a colleague, Dr D. Woodrow, i.e. 'Is there now an essential survival level of numeracy? ... If there is a survival level, what is it?' He goes on to point out that there is no real research evidence for the existence of such a survival threshold. He is of course quite right. And yet? What we can certainly say is that there are survival situations, sometimes immediately disastrous, as when a family are evicted for rent arrears or someone, in desperation, breaks into their own gas meter, sometimes slower acting but erosive, as when a woman, despite sufficient income worries her way from one tradesman to the next. What we can also say is that, while personal and emotional factors might play a large part in these, there is also a requirement for a mathematical adequacy, often in terms of broad estimation. It is the knowledge and understanding that serves this sort of end that we must check on and ensure, particularly at the secondary stage.

So far as number is concerned then what basic areas of understanding should we record? Here both correspondents and also various members of the Association of Teachers of Mathematics, who are circulating discussion documents on mathematics and the slow learner, seem equally unwilling to commit themselves. Yet if we are to make much progress in improving method then surely the broad content of the subject, at least at a minimum level, has to be agreed first. One of the reasons that maths is so low in the priorities of remedial departments is that teachers know from their everyday lives that much traditional computational maths is irrelevant to basic needs. In daily affairs, outside our professional lives, how often do we need long multiplication or division, or the four rules applied to measures or fractions, or any written computation virtually? We must find other justifications for its inclusion in our syllabus, than merely basic needs.

With this in mind the checks I would make to record on punch card in so far as number is concerned – ten checks to suit the standard ten hole card most commonly available –

would perhaps be as follows:

- 1. Conservation of number. This is a late check to make at the secondary stage but so much depends on its complete realization that it should not be assumed. A previous article suggested test sources. Try to make the perceptual contrast between the compared groups as wide as possible - e.g. marbles compared with buckets. Unless the idea of an unvarying number can withstand this sort of contrast the necessary flexibility of thought will be lacking.
- 2. Ability to 'count on' adding an extra two items to a group of, for example, seven, can the child count on, '8, 9'? What is at stake here is a logical understanding that can take in objects as simultaneously belonging to a complete subgroup and the overall group. This understanding can be crucial for learning bonds, group counting and tables. Read about Dorothy discovering odds and evens in the 'Real Learning' section of John Holt's How Children Fail if this sounds academic.
- 3. Commutativity of addition realizing that the order of addition does not matter. If you tell him that 19+7=26can he tell you straight away what 7+19 are? It is a realization that halves the memory task of learnings bonds and gives a lot of flexibility to computational juggling.
- 4. Complementary nature of addition and subtraction. If you tell him that 19+7=26 can he tell you straight away what 26-19 are? Or 26-7?
- 5. Knowing number bonds, particularly as related facts. Maybe the child knows that 9+7=7+9 but does he know what the total is without needing to use fingers, counters, etc. He needs this as immediate recall certainly up to ten and, arguably, for totals up to twenty.
- 6. Relating bonds to larger numbers. If he does know that 9+7=16 can he relate the result to 19+7, 29+7, 39+7, and so on. Or with 5+4, can he relate the result to 50+40 and 500+400?
- 7. Ability to count in groups. Even if the tables are not essential knowledge it is still necessary to be able to recognize odd and even numbers and predict their sequence, and to be able to count in 5s and 10s and in a

- mixture of 2s, 5s and 10s as groups of coins are totalled. It is useful too if this can be extended to 25s, 50s and 100s.
- 8. Understanding the symbols $+ \times \div =$ may all be familiar ground so far as an abstract response to textbook questions is concerned but if the child cannot choose the right process in practical situations then the familiarity is wasted. Reading problems which the child summarizes in the shorthand of numbers and symbols makes a simple check.
- 9. Understanding the language. This is perhaps a little unrealistic as a single check since maths at any level has a specific vocabulary which we too often assume but it is worth thinking out a basic list of words possibly using Bell's (1970) suggestions.
- 10. Appreciation of place value. A previous article suggested several simple checks to carry out. This is far too often assumed in secondary children yet attempts to produce estimated answers prior to exact calculations will quickly show the limitations in their understanding. The ability to estimate in respect of number might make a suitable alternative to any of the other checks.

It may well be that checks such as these sound too basic for the secondary stage, yet it is frequently difficulties at these very levels which undermine some of the persistent mathematical failure that students on our year course work with in schools, who often appear as absolute failures on many current tests. If the basic ground is covered at least a firm foundation can be assumed, remembering of course that this check only concerns number and that the understanding needs to be generalized to money, measure and time.

The disparity between teachers' assumptions and pupils' understanding is well illustrated by the Schools' Council (1972) Pilot Survey of Maths Questions, in which forty fairly fundamental questions were given to over 800 children. Their teachers were asked to grade the questions in terms of order of importance. A considerable contrast was found between the teachers' priorities and the pupils' performances, with frequent failure in several important areas, important that is in the teachers' own view.

As one of the participants in the discussion group, Brenda Carter of David Livingston School, Croydon, points out,

'Now, with the emphasis on discovery, activity and freedom, the child who falls by the wayside is less easily recognized. The teacher who herself often fails to find a structure of this subject because she has no real understanding of what is entailed in the mathematical development of young children is not sure of her ground, has no yardstick (or metre rule) by which to measure the progress and so is unable to diagnose the malady, leave alone offer a remedy'.

References

BELL, P. (1970) Basic Teaching for Slow Learners, Muller. CAWLEY, N. (1973) 'Diagnosing difficulties in number', Rem. Ed. 8.2, 27-30.

HOLT, J. (1964) How Children Fail, Penguin Books.
SCHOOLS COUNCIL (1972) Primary Maths Project. Pilot Survey of Maths Questions, University of Reading School of Education.

Evaluation of new materials: 35 An evaluation of an approach to history for remedial pupils

A. Simon and L. O. Ward

Until recently little attention had been given to producing materials suitable for remedial pupils studying history. The recent publication by Brown (1971) is an attempt to provide such materials. The present paper is an evaluation of the suitability for remedial pupils of the approach devised in the programme, the relationship (if any) between achievement in the test and in the subtests and the various factors of age, sex, intelligence, reading-age and school, and the correlation between achievement in the test and teachers' ratings for general achievement and persistence.

Description of tests and materials employed

A. The work-unit test

The programme consists of fifty-two work-cards, each of which included a picture, a narrative and questions. In this paper an analysis of one representative work-card is described in detail. The work-unit selected for evaluation was as follows:

- 1. A picture of a prehistoric home at Skara Brae.
- 2. A descriptive passage based on the picture.
- 3. Twenty questions falling into four sections filling gaps in sentences (items 1-5), copying-out and indicating the truth or falsity of a statement (items 6-10), reasoning on the basis of the materials in a factual way (items 11-15), and finally deducing conclusions from the data (items 16-20).

B. Intelligence test employed The intelligence test employed was Raven's Matrices (1958).

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Raw scores were converted to IQs.

C. Reading test

The tests given were the Schonell Reading Tests, R1 and R2.

D. Teachers' ratings

The teachers were asked to rate the pupils on a five-point scale for general educational achievement and for general persistence.

Sample

The total sample was composed of fifty-nine pupils in the age-range from 11 years 4 months to 12 years 9 months; these pupils comprised thirty-one boys and twenty-eight girls and were drawn from the remedial or semi-remedial forms of two comprehensive schools.

Results

Table 35.1. Mean scores and standard deviations of the total sample and of the sexes on the evaluation test.

Groups	N	Χ̈	SD
Total sample	59	11·22	4·89
Boys	31	10·55	5·18
Girls	28	12·10	4·31

The mean difference between the sexes is not statistically significant.

Table 35.2. Mean scores and standard deviations of schools A and B on the evaluation test.

School	N	X	SD
A	29	10·79	4·79
B	30	11·63	4·95

The mean difference of 0.84 is not statistically significant.

Table 35.3. Mean chronological age, IQ and standard deviations of the total sample.

Category	N	X	SD
CA	59	132 (months)	4·30 (months)
IQ	59	83.64	9.02

Table 35.4. Mean IQs and SDs of schools A and B and of the sexes.

Category	N	X	SD
School A	30	81.60	7.77
School B	29	85-60	10-41
Boys	31	81 · 19	9.28
Girls	28	85 · 46	10.40

The mean difference between schools A and B is not statistically significant, and the mean difference between the sexes is not statistically significant.

Table 35.5. Frequencies of high and low scores obtained on the evaluation test by older and younger age groups.

	Gı		
Score	Older	Younger	Total
14 d abovo	14	9	23
14 and above Below 14	17	19	36
Total	31	28	59

 $[\]chi^2 = 0.76$ for 1 df which is not statistically significant.

Table 35.6. Frequency of high and low scores on the evaluation test obtained by pupils belonging to different IQ groups.

High (87+)	Group IQ Low (Below 87)	Total
17	6	23
8	28	36
25	34	59
	(87+) 17 8	High Low (87+) (Below 87) 17 6 8 28

 $\chi^2 =$ statistically significant, for 1 df, at 0.001 level.

Table 35.7. Mean reading ages and standard deviations, in months of schools A and B.

School	N	Ī	SD
A B	29 30	103 · 40 113 · 10	22·90 9·50
Mean difference		9.70	

The mean difference between the two schools, 9.70 months, is not statistically significant.

Table 35.8. Frequencies of high and low scores obtained by good and bad readers.

Reading group	Te		
	High (14+)	Low (below 14)	Total
'Good'			
(RA 10 yrs +) 'Poor'	15	6	21
(RA below 10 yrs)	8	30	38
frequency	23	36 for 1 df at the	59

Table 35.9. 'r' coefficients of correlation between total test score, CA, IQ and RA (N=59)

Variable	Test score	CA	IQ	RA
Test score		+0.18	+0.67	+0.66
CA	+0.18	_	+0.11	+0.08
IQ	+0.67	+0.11		+0.88
RA	+0.66	+0.08	+0.88	

Table 35.10. Frequency of high and non-high scores falling into two categories, viz. persistence and total score.

Score	Persist 5-4	tence score 3 and below	Total
14+ Below 14	15 14	8 22	23 36
Total	29	30	59

 $\chi^2 = 3.90$ significant at 0.05 level.

Table 35.11. Frequency of high and non-high scores falling into the categories of achievement and total score.

Score	General acl	Total		
	5-4	3 and below	2000	
	19	4	23	
Below 14	6	30	36	
Total	25	34	59	

 $\chi^2 = 25 \cdot 12$ significant at $0 \cdot 001$ level.

Table 35.12. Frequency of high and non-high scores falling into the categories of achievement and persistence.

Persistence score 5-4 3 and below	General acl	General achievement score			
	5–4	3 and below	Total		
	19	10	29		
	6	24	30		
Total	25	34	59		

 $\chi^2 = 12.54$ significant statistically at 0.001 level.

Table 35.13. Means and standard deviations for various categories on the evaluation test.

Category	N	$\bar{\mathbf{X}}$	SD
A B C D	59 59 59 59	3·89 3·25 2·67 2·02	1·30 1·52 1·62 1·92

Table 35.14. Coefficients of correlation between category scores, CA, IQ and RA (N=59)

			_		
Category	A scor	e/CA	=	+0.13	
	В "	22	=	+0.15	
33	С "	77	=	+0.08	
,,,	D "	33		+0.20	
Category	A scor	e/IQ	=	+0.38	
33	В "		=	+0.43	
>>	C ,,			+0.52	
22	D "			+0.61	
Category		e/RA	=	+0.31	
>>	В "	77		$+0.47 \\ +0.40$	
>>	C "			+0.55	
17	D ,,	27			

Table 35.15. Mean differences for various categories of the test.

Category	A	В	С	D
A		0.64†	1·22* 0·58†	1·87* 1·23*
B C	0·64† 1·22*	0.58†		0.65
D	1 · 87*	1-23*	0.65	

^{*} significant at 0.001 level.

[†] significant at 0.05 level.

Remedial education: programmes and progress

Table 35.16. 'r' Correlations of coefficient between various categories.

Category	A	В	С	D
A	_	0.23	0.14	0 · 32
В	0-23		0.39	0.37
C	0-14	0.39		0.56
D	0.32	0.37	0.56	_

Table 35.17. Discriminative power, validity index and difficulty index for each item of the test.

Item	Dis. P.	VI	Diff. I.
1	8	-53	·73
2	5	·33	·83
3	6	-40	.80
4	6	•40	-80
5	4	-26	.40
6	8	· 53	.53
7	7	·43	.70
8 9	3	.20	.23
10	8	· 53	· 4 7
10	7	· 4 3	.70
2	12	-80	.60
.2	11	·73	.37
.s [4	13	-86	.43
1 4 15	11	·73	.37
.5 !6	11	·73	.37
l7	14	.93	.47
8	15	1.00	-50
9	13	·86	.43
20	14	.93	.47
	12	.80	.40

Discussion

Reference to Table 35.1 shows that sex does not influence significantly performance on the work-unit test; neither does the type of school the pupils attended influence results significantly (see Table 35.2).

Consideration of Tables 35.3 and 35.4 leads to the following comments. Firstly, the intellectual level of the sample, in general, is low as might have been expected of children in remedial or semi-remedial forms. Secondly, the pupils in schools A and B are comparable as regards intelligence level and the same comment applies to the intelligence level of the sexes.

Analysis of Table 35.5 reveals that the age factor does not seem to be important within the age range considered as regards ability to attain high or low scores.

Examination of Table 35.6 indicates clearly that intelligence level is a factor determining performance on the work-unit test. Despite the fact that the mean intelligence level of the sample is well below average within the range of this sample it seems that a slightly higher intelligence level is important in obtaining significantly superior test scores. The results given in Table 35.6 can be best interpreted by an analysis of the nature of the test items. These items do demand a minimum ability to observe relationships, to follow a simple discussion, and to deduce certain conclusions. Such activities are components of any intelligent activity.

Table 35.7 reveals that the pupils in the two schools who were selected for the sample did not differ significantly, in general, in reading age. However, this does not mean that the level of reading ability does not affect performance on the work-unit test since reference to Table 35.8 shows that when pupils were classified into various categories according to test scores and reading age level there is a significant tendency for 'good' readers to do better than 'poor' readers on the workunit test. To some extent this finding can be explained by the fact that ability to comprehend the narrative is related to ability to read well. The implication educationally as regards a history pack-unit is that if it is to produce maximum benefits there must be a minimum proficiency level in reading.

The importance of intelligence level and reading ability within the sample studied on performance in the test is clearly indicated in Table 35.9, where correlations of coefficient between the variables of test score, IQ and reading age are positive and highly significant statistically.

There is some evidence that a personality factor influences performance in the test. Scrutiny of Tables 35.10 and 61.11 reveals that there is a strong tendency for those who are highly rated for persistence and general educational achievement also to do well on the work-unit test, thus establishing the suitability of this kind of activity for these children. The findings given in Tables 35.10 and 35.11 when coupled with the significant association between persistence and general educational achievement given in Table 35.12 indicate clearly that the teacher who is able to encourage his pupils to persist will almost certainly raise their level of simple historical knowledge and understanding.

Table 35.13 shows clearly the fall in mean score for categories as one proceeds from A to D, category A being the easiest and category D being the most difficult. Reference to Table 35.15 shows that mean category scores for A and B differ significantly from all other mean scores, and that the mean category score difference between C and D is not statistically significant. The latter finding is not surprising when Table 61.16 is examined. It shows that categories C and D are fairly substantially correlated. In fact analysis of the items reveals that categories C and D are rather similar in content in certain

Examination of Table 35.14 reveals that in no case does chronological age appear to be influential with respect to category score, but the same finding does not apply to reading ability and intelligence levels. It is true that both reading ability and intelligence level exert less influence on category A scores than they do on the other categories, in particular category D. The reason for the discrepancy between category A and the other categories is probably due to the simpler nature of the material in this sub-test, entailing less complex mental operations than for the other categories. In category A there are four questions which are answered by filling in a gap

provided on the reverse of the work card. The pupil's cognitive functions are mainly limited to following instructions and employing matching techniques. The results obtained for the other categories when considered in conjunction with the nature of the test items indicate that these categories involve additional and/or more complex mental operations. For instance, to succeed on category D the pupil has to be successful not only in recalling certain facts but also in deducing from given criteria certain conclusions from the presented data.

Table 35.17 shows the discriminative power, validity index and difficulty index for each test item. No item was passed by 100 per cent of the sample; it will be observed that items 11–20 have more discriminating power than items 1 to 10. Employing the validity criteria suggested by Garrett (1958) all the items in this work-unit test are valid, but there are great differences in the degree of validity for various items. The two items with the lowest validity indexes were items 5 and 8, and the three items of the highest validity were items 16, 17 and 18. This provides final evidence that the approach provides for remedial and semi-remedial pupils a suitable, graded series of items involving various kinds of elementary historical understanding.

References

BROWN, K. (1971) History Workshop, Macmillan.
GARRETT, H. E. (1958) Statistics in Psychology and Education, 5th edition, New York, Longman.

Specific learning disabilities and their treatment

If there is one point about which 'experts' in remedial education agree, it is on the multiple causation of learning failure. Gone, at least from the educational literature, are the old dogmas about brain damage. Gone is the belief that most poor readers are left-handed (Clark, 42 p.316). Gone, or going, is the belief in diagnostic tests as a panacea. However, there is no point whatever in discarding hard-gained knowledge simply because some of the terminology has gone out of date, or the treatment programmes have gone out of fashion. If it helps some people to attain clarity of diagnosis, terms like 'dysgraphia' and 'dyslexia' serve a purpose. Unfortunately, they generate a disproportionate amount of heat, so that it is not always easy to separate the emotional response from the rational reply. This is especially true of the term 'dyslexia' (38, 39, 40). All remedial teachers are aware of the existence of children with extreme learning difficulties; whether much is added when one calls them 'dyslexic' is far from clear. Professor Miles certainly thinks so, and the valuable discussion continues.

Dividing the population of poor readers into two large groups, visile and audile, was one of the earliest distinctions in the specific learning disabilities (SLD) literature. It may be that prescriptive teaching based on such a preliminary diagnosis offered too simple a solution; even so it is usually obvious when a child has gross visual or auditory deficits, and learning programmes based on such information can often be very effective (37). The search for solutions to these children's problems is, in truth, the most intellectually satisfying part of the remedial teacher's work.

36 A revision of the Swansea Test of Phonic Skills

Peter Congdon

The Swansea Test of Phonic Skills (Williams, P., Congdon, P. J., Holder, M., Sims, N. W. R., 1971) is a recent attempt to measure in a detailed and systematic way a child's phonic knowledge. Unlike most existing measures in the area it allows for group administration and is suitable for children of infant school age. Test results yield a profile of scores in such areas as long vowels, short vowels, initial letter blends and final letter blends. Aggregate scores may be converted into

reading ages.

The technique employed in the test is as follows. Each phonic element is incorporated in a test word which is placed with four other nonsense or pseudo-words containing similar but not identical, phonic elements. It is the task of the testee to identify the correct word in each block. For example, in the item which tests knowledge of the initial blend 'cr' the following words are presented: scut - frut - crut - drut - trut. The examiner says the word 'crut' and the child is required to locate it and then draw a ring around it. The use of nonsense words helps to eliminate the influence of such factors as word meaning, whole-word memory and the more subtle impact of cultural background. Nonsense words are not a vehicle for context cues or partial cues in the word itself. In all some sixty-five items arranged in their various phonic categories are included in the measure. In computing norms for the test total scores were subjected to a guessing correction.

The original experimental version of this test has now been revised by the present writer (Congdon, 1972). The revision was carried out in three stages. The first, or preliminary stage, was concerned with a detailed examination and analysis of items employed in the original standardization. The second stage was concerned mainly with the improvement and rearrangement of test items and the application of the revised

test to check that improvement. The third and final section of the revision was concerned with a further improvement of the test items and the standardization of the final Test of Phonic Skills.

An important part of the revision was the computation of efficiency indices for each of the test items. An examination of test results used in the original standardization disclosed that the majority of the items had an efficiency index below that of 0.45 which is the standard used by Moray House as an acceptable index. An examination of those items with low

Table 36.1.

Test		No. tested	Mean score	Standard dev.	r
Southgate	(1)	67	47	19.9	. 86
Word Selection	(2)	60	28	20.4	- 88
Test	(3)	78	41	19.1	. 89
Burt Word Readin	g Test	65	45	18.5	· 85
Schonell Word Recognition Test		85	44	19.5	-83
Jackson Diagnostic Test of Phonic Ski	lls	70	47	16.0	- 89
Goodenough-Harr Draw-a-Man	is (1)	60	28	20.4	-62
Test	(2)	68	48	19.9	. 54
1 681	(3)	78	41	19.1	-77
English Picture Vocabulary Test		61	42	22 · 4	-63

efficiency indices showed that many of their distractors or decoys were in fact not functioning satisfactorily. The power of a distractor would appear to be in two principal areas,

namely those of visual or auditory discrimination. Confusion in the visual area can result among letters which only differ by asymmetry with respect to axes or points, e.g. b, p, d, or among those which contain diagonals, e.g. y, k, z. Likewise auditory confusion can result among letters or groups of letters which have similar sounds, e.g. b, d, t, or f and thr. In order to make the distractors more plausible, therefore, recourse was made to these two areas. Reference was also made to a list of letters which children tend to confuse (Dechant, 1969, p.27) and to published matrices of acoustic confusion in short-term memory (Conrad, 1964, p.78). The latter were the outcome of an experiment in which letters were visually presented for immediate recall and later auditorily presented against a white noise background. Conrad found that errors showed a systematic relationship to the original stimuli. The errors, he found, could be objectively defined, counted and treated statistically. This enabled him to draw up matrices of listening confusions. Such tables offered a source of scientific data to the present experiment in the construction of distractors for the various test items.

The revised test also differs from the original one in a number of other respects. For instance, in making the selection of phonic elements to be tested it was felt that priority should be given to those which were the most consistently useful. Accordingly, attention was given to McNally and Murray's Key Word List (McNally and Murray, 1962). This is a list of 200 words which account for 'half to three-quarters of the running words occurring in everyday reading matter'. Reference was also made to a list of letter blends drawn up by Fry (1964) who grouped these elements in terms of frequency of use. The revised list consists of sixty-eight items.

In re-standardizing the instrument more extensive validation data were gathered. Test results were correlated with a group word selection test of reading; two individually administered reading tests; an individually administered diagnostic test of phonic skills; a mental ability test and a vocabulary measure. The following results were recorded:

Data on the reliability of the revised test were as shown in Table 36.2.

Table 36.2. Reliability of revised test.

Type of reliability	No. of te	stees	Reliability coefficient
Split-half (Spearman-Brow formula)	vn 60	60	
S	tandard error of	measureme	nt
No. tested 60	Mean 28	SD 20·4	SE meas

An analysis of variance calculated on the raw scores on the Test of Phonic Skills of 120 testees gave significant F ratios between reading age groups (p < 0.001) and intelligence levels (p < 0.001). An analysis of covariance was also computed. This gave significant F ratios (p < 0.001) for both the covariates of reading age and intelligence.

At each stage of the investigation a list of item efficiency values was drawn up. Of the sixty-eight items of which the final test was composed all but eight reached the efficiency level of ·45. Thirty of these reached a level of ·60 and above. This compared very favourably with the original analysis where of sixty-five items only twenty-nine reached the efficiency level of ·45. Since the Test of Phonic Skills was to be used for diagnostic purposes it was considered particularly important to achieve relatively high item efficiency levels. Any deficiency here could undermine the opportunity of profile analysis where reference is made to individual items and groups of items.

The final version of the Test of Phonic Skills was also applied to a sample of children who had been taught in the ita medium. Before comparing the results of this latter sample with those taught in t.o. it was first established that the former had no advantage in so far as its testees had higher mean reading ages. It was discovered that at both the upper (6y 10m7y 9m) and lower (5y 9m-6y 9m) reading age levels the ita group in fact recorded lower mean reading ages on the Southgate Reading Test (1958) than the t.o. group. Despite this initial disadvantage, however, the ita group demonstrated an overall superiority on the Test of Phonic Skills. The results are presented in Tables 36.3 and 36.4.

Table 36.3. Mean scores on the Test of Phonic Skills for recording age range 5y 9m-6y 9m.

		Mean scores
Ne	o. tested	on TPS
t.o. group	53	15
ita group	45	29

At this, the lower reading age level, the ita children recorded a considerably higher mean score on the Test of Phonic Skills than the t.o. group. A t test on the data gave the following result:

$$t = 4.698$$
 $df = 96$ significant at 0.001 level.

Table 36.4. Mean scores on the Test of Phonic Skills for reading age range 6y 10m-7y 9m.

Table 36.4 shows that at the upper reading age level the ita group, despite the disadvantage of having a lower mean reading age score, again recorded the highest mean score on the Test of Phonic Skills. A t test on the data gave the following result:

$$t = 3.02$$
 $df = 92$ significant at the ·01 level.

These results would suggest that children taught to read by

means of the ita medium will tend to show superiority in phonic analysis in the early stages of reading over children taught by more traditional methods. Questions which remain unanswered revolve around the desirability of developing early analytic skills in reading and what effect this might have on their later fluency, comprehension or interest in the subject. Moreover, in any replication of this experiment it might be useful to compare the results of an ita group with those of a group taught by a systematic phonic approach such as that advocated by D. H. Stott (Programmed Reading Kit, 1962), J. C. Daniels and H. Diack (Royal Road Readers, 1954), M. Reis (Fun with Phonics, 1962) or the Lippincott approach (described in Tanyzer and Alpert, 1965). These latter might be equally successful in helping children to identify unfamiliar words since it is sometimes held that the superiority of ita does not arise from the nature of the alphabet used but from the fact that it facilitates a 'phonic method' of teaching reading and thus any procedure which confines itself in the early stages to the phonic regularities that are found in English, whether written in an old or new alphabet, will almost certainly produce better results than conventional teaching in t.o.

The revised test would appear to be a reliable instrument for the measurement of a child's phonic skills. Like the original experimental version it emphasizes the need to examine the quality of a child's reading ability rather than merely to obtain a quantitative estimate.

References

- CONGDON, P. J. (1972) 'The development of a pattern of phonic skills in Children of infants school age', unpublished PhD thesis, London
- CONRAD, R. (1964) 'Acoustic confusions in immediate memory', Brit. J. Psychol., 55, 75-84.
- DANIELS, J. C. and DIACK, H. (1954) Royal Road Readers, Chatto & Windus.
- DECHANT, E. (1969) Linguistics Phonics and the Teaching of Reading, Charles C. Thomas.
- FRY, E. (1964) 'A frequency approach to phonics', Elementary English, 51, 759-65.
- McNALLY, J. and MURRAY W. (1962) Key Words to Literacy, School-master publishing company.

Specific learning disabilities and their treatment

TANYZER, H. J. and ALPERT, H. (1965) Effectiveness of Three Different Basal Reading Systems on 1st Grade Reading Achievements, Hempstead N.Y. Hofstra Univ. Office of Education Co-operative Research Project no. 2720.

WILLIAMS, R., CONGDON, P. J., HOLDER, M. and SIMS, N. W. R. (1971) Blackwell and Mott.

37 Auditory problems and remediation

Doris Partan

Auditory problems have received less attention than visual problems in the diagnosis of children with specific learning disabilities. Diagnostic tests for detecting auditory weakness are not well established, nor are the strategies for remediation clearly defined. My work with children with specific learning disabilities has dealt largely with auditory problems, and I would like to set forth the diagnostic procedures and the remediation techniques which have proved useful.

In diagnostic remediation of auditory problems, the first skills to determine are those of auditory memory for sentences, auditory memory for directions, and auditory memory for letter sounds. We tend to lump these skills together under the heading auditory memory, without realizing they are distinct skills. One boy could retell a story he heard, but was unable to follow directions in the classroom. Another seven-year-old also remembered everything he heard and could follow the teacher's commands, but had the greatest difficulty remembering letter sounds. Another child may know the letter sounds and have problems following directions or recalling auditory information.

Auditory memory for directions

A simple method for determining auditory memory for directions is to give the child a series of instructions. Start with a simple, one step direction, next give two directions, then three. Classroom teachers usually expect the primary school child to be capable of following a series of at least three directions such as, 'Take out your maths book; turn to page 31, and do problems one through five.' The child who gets his book and then does nothing, or resorts to acting up, may not be wilfully disobedient. He may be incapable of remembering the series of things he was asked to do, or, indeed, feel pleased that he recalled even one command.

Mothers are often the first to recognize this difficulty in auditory memory for directions. At a parental interview, I have approached the subject of auditory memory with some trepidation, only to have the mother say, 'Oh, I could have told you that. When I ask him to go to the shop for me, he forgets most of the things.' Or, 'I have never been able to get him to go to his room and bring certain things down for me. He always forgets.' The mother, like the teacher, must be helped to understand that the child is not trying to disobey. He cannot, at this stage, retain that amount of auditory information.

Children with this difficulty can learn through memory games like Simple Simon. They are given a series of commands to follow in the form, 'Simple Simon says to . . .' Begin where the child is capable of succeeding and go on to add one more command, or a direction a bit more complicated. Younger children, who find any directions too complex, can begin by placing toys out in a specified order, as for instance, 'Set out the cow, dog, and horse'. Or a board with squares marked off may be used, and the child asked to, 'Place the cow in the top right corner'. When a child is capable of following a direction such as, 'Simple Simon says write, "Mark runs",' he can begin writing from dictation. Training in this skill is much needed by the older boys.

Auditory distraction

Closely related to the ability to follow oral directions, is the problem of auditory distraction. Visual distraction is more easily understood and we all know people who must have their desks cleared of extraneous material before beginning with a difficult task such as filing income taxes. There are also many individuals who must turn off the television, as well as the radio, before they can study. The learning disability child's problem is a bit more complicated. He seems to have difficulty, not only in 'tuning out' irrelevant auditory stimuli, but also in 'tuning in' the particular stimulus, such as the teacher's voice, to which he should be attending. His problem is similar to that of a spy trying to pick up a particular conversation on his tape recorder, who finds he has music from the radio,

rumble of trucks on the street, and steps from the corridor as well. I once was working with a thirteen-year-old, alone in the tutoring room, who kept asking what that awful noise was. I finally realized he was referring to the buzzing of the fluorescent lights overhead. No wonder this boy could not attend to the teacher's directions in the noisy clutter of the classroom.

To help the child overcome this difficulty, it is wise to select a room or corner which is relatively noise free. Since no classroom is ever noise free - even chairs moving or pens scraping are distracting to some children - it is important to increase the auditory distractions gradually. If the child can work alone in a small room, try him at one end of a deserted corridor. If he is still able to follow directions, bring him into the library, or try a quiet corner of the class. When he can tolerate this level of distraction, the teacher's further cooperation is needed. The child should sit in front of the classroom, close to the teacher. The teacher could be encouraged to face the child and the child must be reminded to watch her mouth in order to focus his auditory attention. If the child is floundering under the stress of multiple step directions, the teacher might be asked to give the first two directions, and then repeat the next ones after he has completed the first. This suggestion is also helpful to parents.

Auditory memory for letter sounds

The child with a reading difficulty is often the child with a short memory for letter sounds. If we think of the difficulty in learning a language such as Russian, we might understand this problem better. To learn Russian, one must recognize unfamiliar visual stimuli and correlate each with an auditory response unlike those used in English. To the learning disability child this skill of hooking up an auditory response with made more complicated since one letter, such as a, has many many as eight different spellings. If every symbol in English had one, and only one, auditory response, the task for the learning disability child would not be so enormous.

There are many methods for teaching the child who has

difficulty remembering letter sounds. Lyn Wendon, in her article in *Remedial Education*, Volume 5, Number 2, presented her approach with pictograms. This visual association is an excellent method for many children with poor auditory recall of letter sounds. The Gillingham method, which involves considerable drill in a specific way, may also be used. The major difference between the ordinary phonics work and the phonic drill needed by the learning disability child is in the amount of practice and repetition needed. Also, the phonic skills must be more systematically, and gradually, built up for the child with difficulty.

Isolation of letter sounds

Much has been said in the literature about the skill of auditory discrimination. The term has been variously defined, but I do not feel comfortable using it to describe the learning disability child. By and large, the child does talk correctly. He must, therefore, hear the speech sounds well enough to reproduce them. For instance, when the child spells 'camp' as 'cap', he continues to pronounce it correctly, but simply cannot separate the parts from the whole. His deficit is more like that of the beginning music student when asked to follow the melody of the violas. If he cannot pull out the sound of the violas from the intermesh of the orchestra, he cannot find the melody. There do seem to be distinct mechanisms involved in reproducing a word as a whole, and in pulling out the sounds which have formed it. I prefer, then, to redefine auditory discrimination as an inability to isolate the sounds in words. The distinction is important, not as a matter of semantics, but as an aid in planning remediation. The better we can define a problem, the more readily we can solve it.

Short vowels

The difficulty in isolating sounds in words is closely related to short auditory memory for letter sounds. Although this should be obvious, we often overlook it. The child who does not remember the sound for a, does not know what to listen for when asked to identify the a sound in words. Again, it would be like asking the music student who cannot remember the

sound the viola makes, to follow the viola. Once consonant sounds are learned, I begin with the short vowels. Using the Breakthrough Word Maker letters and stand, we set out the five vowels. First, I make the short vowel sound and the child picks the correct letter. Next, he makes the sound; I must choose. Eventually, the child must learn to say, 'These are the vowels. This is a and it often says a.' Words are then presented with the short vowel sound at the beginning. The child repeats the word, makes the beginning sound - to build up his ability to isolate the sound - and then chooses the vowel. Next, words

are presented with the short vowel in the middle.

When trying to isolate the short vowel in the middle position, it is helpful to ask the child to sing the word aloud for a long time so that the vowel sound is prolonged. Some boys, not so keen on singing, like the description, 'Push that word out long, right through the wall.' One seven-year-old with good intelligence was having great problems in isolating and differentiating the short a and the short i. We finally hit upon the idea of forming his mouth shape with the index finger and thumb of both hands, as he made these sounds. The short a produced wide apart fingers, a more open mouth, than did the short i. The underlying premise in treatment is to reinforce the weak auditory skills through tactile, kinesthetic and visual means. Many of the best tutors are those who have had training with the deaf, and these methods have been adapted from them

Magic E

We next go on to learn the Magic E rule. Knowing the rule does not mean the child can apply it. Does the child know which are the vowels? I realized the error in overlooking this obvious step when I was teaching an eight-year-old. She could repeat the rule, but not apply it. Then she told me how she worked out the word 'cake'. 'E makes the k say kay,' she said! Nor is the description 'long sound' of the vowel helpful to these children, so I use the definition 'own name sound'. But the child with poor memory for letter sounds continues to confuse which is the 'own name' sound and which is the 'plain vowel' or 'short vowel' sound. It seemed to help this eight-288

year-old when she was told E had a job; he was Mr Introducer. He sneaks up behind the a and tells a to introduce himself. So a must say, 'In the alphabet, I am letter a.' We also played the Magic E game. She held the Magic E in her hand while words were said. Each time, she had to repeat the vowel sound in the middle. If the vowel introduced itself, she was to raise up the E.

Blends

The separate sounds in blends present a problem to some children. One seven-year-old had particular difficulty with the r blends. He was asked to say the word 'trap' loudly and slowly, all the time feeling what his lips and tongue were doing. When he still could not isolate the r sound, he used the Word Builder to set out the letter sounds he heard. 'tap' appeared in the stand. The letters were moved apart to leave a space between the t and the a. He was asked again to pronounce the word, and as he made the r sound, I pointed to his mouth. We repeated this procedure several times as he strove to listen for the sound he was making. Sometimes, it helps the child become aware of what his mouth is doing if he is given a mirror to watch.

Other children are unaware of the sounds m and n in such words as plant or camp. Here again, the mirror is useful as the child can see the lips touching to make the m or n sound. Or the child may be asked to put his fingers in his ears as he says the word loudly and slowly. The m and n make a definite vibration when this is done. This method is not foolproof as other sounds also produce vibration, but it remains useful in isolating these two sounds.

Auditory reversals

Less is known about auditory reversals than about visual reversals, yet there are children who have trouble differentiating between the beginning and the ending of words. As one eleven-year-old told me, 'But you know, I remember the sound you made last, first.' To him, when remembering back for what was said, the end sound was clearest in his auditory memory. It seemed more 'first' to him, than did the beginning

sound which, in thinking back, seemed farther away. This difficulty may be overcome through the use of visual cues. If a green block is placed out along with the beginning sound of a word, and a red block is presented simultaneously with the final sound, the child has concrete visual cues to help distinguish beginning and end. He is then asked, 'Which sound did you hear at the beginning, with the green block? Which sound did you hear with the red block at the end?' Other children learn to isolate the middle vowel sound more easily if given a visual cue, such as presentation of a yellow block, to represent the middle sound. Games can be played changing bat to hat, or hat to hit, and the child asked to indicate which block and which sound was altered.

Difficulty in isolation of letter sounds can be a contributing factor in auditory reversals. One boy wrote thorn as 'thron' and only after being asked to sing the word out long and slowly, did he suddenly realize that the o sound came before the r sound. This same technique may help overcome the common reversals of form and from.

Auditory blending and sequencing

Some children cannot blend a series of sounds together in the proper sequence. The word blot for example, might be spoken as 'btol'. The strong t sound has intruded itself after the initial consonant instead of coming at the end. Other children will sound out blot by saying, 'bu-lu-o-tu', and then asking what buluotu means. In some cases, this is due to faulty training in phonics whereby the vowel is heard along with the consonant. More often, however, the skill in carrying one sound along until it joins the next is lacking. Sometimes, the child will learn to connect the sounds if given a motor act to represent the blending. In learning bat, he could push the green block along while saying the b sound, bump it quickly into the yellow block with the a sound, and hit the red block while saying the t sound. One five-year-old attained success in blending by running his fingers under the word printed on the chalk board, as he said it. Another boy learned to blend by beginning with his hands far apart and finishing the word as he clapped them together. Older youngsters may have problems with

multisyllabic words. Practice in the syllabication skills, followed by work with syllables printed on separate cards which were then pushed together, helped a fourteen-year-old girl with this difficulty.

Auditory perseveration

Children may demonstrate auditory perseveration, the senseless repetition of words or sounds. One seven-year-old boy with blending problems had worked long and hard on learning the st sound. The next word in the series he was to read aloud, slack, came out as 'stack'. Flag was read as 'stag'; bland came out as 'stand'. When I realized what he was doing, I explained to him that he had a sound stuck in his mouth and must shake his mouth out so it was empty again. Perseveration may be similar to the feeling a person experiences when he says he has a tune stuck in his mind which keeps repeating itself. The child who perseverates is usually not aware of what he is doing, and needs help in recognizing the repetition when it occurs.

Learning aloud

One further comment is needed on the relationship between oral work and the skill of isolating sounds in words. A thirteenyear-old boy found it helpful to mouth his words aloud as he was writing. If he was not allowed to mumble as he wrote, he left out consonants or whole syllables which he was able to insert when permitted to mumble through his work. This takes the cooperation of the classroom teacher who must be persuaded that the long cherished goals of silent reading and silent writing are not the best for everyone. A fourteen-yearold girl first clued me in to the importance of oral reading for retention. When she first came for tutoring, she carefully explained that she had difficulty remembering assigned readings. She discovered that when she took the work home and read it aloud, she could retain the contents. For her, reading without hearing, produced no real learning.

Reference

WENDON, LYN (1970) 'Decoding for dyslexia', Rem. Ed. 5.2.

38 Dyslexia: some practical needs T. R. Miles

By a 'dyslexic' child I mean one who has difficulty in a few special areas (including spelling in particular and usually reading as well) but who is usually quite able to cope with tasks involving abstract thought, comprehension, and immediate memory. Usually there is an accompanying difficulty over spatial relationships. Often this takes the form of confusion between b and d or p and q outside normal limits, i.e. beyond the age of seven or eight, though it may take other forms, e.g. failure to put the knife and fork on the correct side of the table or failure to repeat the syllables of long words in their correct order. If ever you come across a child whose educational difficulties are specific to reading and spelling (but who is otherwise fairly bright) and who has difficulties both over direction and over recognising the 'look' of words, then you may be sure that this is a child whom many of us would wish to label as 'dyslexic'.

Some teachers and educational psychologists have disputed whether such a condition as dyslexia genuinely exists. I do not propose in this article to discuss the theoretical issues, since I have done this elsewhere (Miles, 1967). The main reason why I feel strongly on this matter is that, unless we use the label, we may very well make the wrong practical decision in respect of these children. The last thing I want to do is to pick quarrels with people over labels; but what is at stake is a decision as to how human beings should be treated.

The main thing I wish to plead for is a change of orientation. Our present policy in Great Britain towards backward children is permeated through and through with what may be called the 'child guidance' attitude. I am not of course disputing the valuable work done at child guidance clinics with suitably selected cases, that is, with emotionally disturbed and insecure children and their parents. What bothers me is the tendency,

in the case of backward children, to attribute their difficulty – all too uncritically – to emotional disturbance. In medical terms one might speak of changing from a psychiatric orientation to a neurological one; in educational terms it is a change which involves willingness to take signs of backwardness at their face value instead of assuming that they are symptoms of underlying emotional disturbance. (Those wishing to extend their knowledge on the neurological side are referred in particular to Critchley, 1964.)

I do not of course dispute the obvious fact that sympathetic parents can do a great deal to help dyslexic children; and I have certainly met dyslexic children (though in fact surprisingly few) who were difficult or emotionally disturbed. In most of these cases, however, it has seemed to me fairly clear that the emotional disturbance is the result of the dyslexia; parents or teachers have simply failed to understand the child's difficulties. To explain the backwardness in terms of emotional disturbance is often, in my opinion, to put the cart before the horse.

Let me now try to characterize the difficulties of dyslexic children as I see them. If one looks at their spelling one is likely to find some very strange mistakes. It is plain that somehow the 'look' of the written word does not register with them in the way in which it does with normal readers; hence, when they have written something, they have no visual means of 'monitoring' it, i.e. of telling whether what they have written is right. Another difficulty is that, if shown the correct spelling, they are likely to forget it a few moments later. Hence if a teacher scolds them they are doubly bewildered and mystified: not only may the scolding seem unfair since they may well have tried extra hard; in addition they have not the least idea as to what it is they have failed to do. Time and time again the children whom I have taught have written a word and tried to check it by one of the few devices open to them - my own facial expression! Sometimes they say the word very carefully to themselves, and indeed words that to us are completely bizarre in respect to their 'look' are often quite plausible phonetically, e.g. 'sopost' for 'supposed' or 'becend' for beckoned'. Often there is what may be called 'overlay' from acquired knowledge; thus the child may vaguely remember that, say, a g-h or a t-h ought to come somewhere in the word, or that some words have a final 'e', and on the basis of these vague memories he adds such letters in a haphazard way - e.g. 'wthe' for 'with'.

Here are some examples of particularly odd spelling. These will enable you to tell what happens in severe cases of dyslexia, though of course in many cases the disability is milder than this.

- 1. One day feoul chilir went to rsg they Mother wech will we b going for rw holday.
- 2. Wen had a lant Roil lot yout it was a wit want.
- 3. We pat a Negl in the water, fast we pat a pes of blating papa in the water, and pat the Negl on it and the papa sanc and the Negl acded on the Surface Tension.

These examples were copied from exercise books of the children concerned. All these children were above average IQ according to the traditional tests, the third having in fact a WISC IQ of 128. The following is, as far as I know, what they were trying to say:

- 1. One day five children went to ask their mother, where shall we be going for our holiday?
- 2. We had a land rover last year; it was a white one.
- 3. We put a needle in the water. First we put a piece of blotting paper in the water and put the needle on it, and the paper sank and the needle acted on the surface tension. (The correct spelling of 'surface tension' is so surprising that one must assume it was written on the blackboard!)

What can be done on the practical side? In the long run I should like to see centres set up in various parts of the country, to which teachers could be seconded for suitable periods of training. These would be centres exclusively for the study of dyslexia and related disabilities. The present arrangements for training teachers and educational psychologists to understand the problems of dyslexia seem to me utterly inadequate. Indeed I would not mind people being obstinate and polemical over the actual label 'dyslexia' if only they would get down to working out properly and adequately what the needs of these

children are. This they have conspicuously failed to do. Today a dyslexic child may well be in a class of children far duller than himself, in the hands of a remedial teacher who has read little about dyslexia, and who is visited, once a month at best, by an educational psychologist who 'doesn't believe' in dyslexia and has never been grounded in the relevant parts of neurology. If such a child is eventually sent to a child guidance clinic, such is the present climate of opinion that he himself may be branded as emotionally disturbed and his parents may be led to infer that they are neurotic worriers. No one disputes that resources are limited, but at least let us channel existing resources in the right direction.

What can be done as a temporary palliative? The first thing is that all those concerned with remedial education should be on the lookout for otherwise bright children whose weakness is specifically limited to reading and spelling. If in the case of these children they find rather strange spelling, some of it phonetic, and if they find that the child by looking at what he has written cannot see anything odd about it, it is a fair prediction that such a child will not grow out of his difficulties without careful individual attention. This prediction will be all the stronger if some of the subsidiary signs mentioned in paragraph 1 of this article are also present. In such cases there is no short cut. Very careful thought is needed in studying what exactly it is that the child cannot do; standards of whether the child has done 'well' or 'badly' need to be adjusted (often even the pathetic attempts at spelling cited above are the result of enormously hard work); extreme patience is needed when the same mistakes crop up again and again, and if the child's mistakes are simply corrected with no indications of how he went wrong the result is likely to be frustration for both teacher and child. (In my experience it is helpful to get the child to say the words very carefully and concentrate on the movements of his lips, tongue and throat as he does so. The children whom I have taught have all learned with no difficulty that certain movements correspond to certain letters; hence they learned to build up words by a rule instead of having to memorize each word by heart. The main limitation of this method is its failure to help the child over words which

are irregular.) Above all the teacher should make clear that he understands - or at least is trying to understand - the child's difficulty. Indeed this is one of the central reasons why I feel one cannot manage without the label 'dyslexia' or some equivalent term. One needs to make explicit that the child is suffering from an identifiable condition for which he is not to be blamed; 'here is another weak speller' simply fails to bring this out. It may be objected that to say 'Your child is dyslexic' is simply 'telling parents what they want to hear'. My answer would be: of course the parents are relieved when their child is labelled in this way, since such labelling makes sense of what was otherwise quite baffling. Time and time again I have met parents who could see that their child was not simply dull but who were utterly bewildered by his performance at reading and spelling. Any label which gives honest information about such a condition is surely justified, even if the information is limited in scope and the predictions are probable rather than certain. It is a curious legacy of the 'child guidance' mentality that 'reassurance' and 'telling parents what they want to hear' are viewed by some educational psychologists with considerable suspicion.

Finally here are three suggestions for immediate action:

1. Press for more manpower. It seems clear from the existing evidence that only a large amount of coaching, individually or in very small groups, will help these children over their difficulties; and it may well be that not all Directors of Education appreciate the magnitude of the need. (I do not wish to be dogmatic as to who exactly should be included in such groups; but normally they would consist of reasonably bright children whose weakness at reading and spelling prevented them from keeping up with others of the same intellectual level. Such children are, of course, quite out of place in a class for 'dull' children, i.e. children whose intellectual level.is weak all round.)

2. In the absence of special training courses evolve your own methods as best you can.

3. Pass on your experience to others, till concern for these children becomes nationwide. I am sure there is no lack of

Specific learning disabilities and their treatment

goodwill, but informed opinion and careful planning are needed in addition.

References

CRITCHLEY, M. (1964) Developmental Dyslexia, Heinemann Medical Books.

MILES, T. R. (1967) 'In defence of the concept of dyslexia', in John Downing and Amy L. Brown, eds., *The Second International Reading Symposium*, Cassell, pp.242-60.

39 Dyslexia: response to Professor Miles; dyslexia and I

M. J. N. Nemby

Shoelaces remained a mystery for some time. Clumsiness in following and copying other people's actions hindered my writing and other activities involving good coordination.

Instructions involving spatial relationships left me out of step more often than not. Spelling was never less than two errors a line. Reading was not a very happy occasion. Later on Geometry tied knots in my mind as I could never visualize exactly what was wanted. Making models was a frightening experience. But what exactly does dyslexia mean to me today?

Spelling

My spelling is rather uneasy. Often it is the simpler word that fools me, rather than words I learnt in later life after I had to some extent overcome my handicap. Take 'Geraffe' or is it 'garaffe' or something else. I don't know. There are many words that I cannot begin to spell but usually I either avoid using them, by putting a substitute in, or I can use a dictionary, not always successfully because I cannot visualize the word, or I ask my wife. I print words rather than join them up. How do I see a word in my mind? 'b-e-d' is disjointed with only the 'c' appearing clearly in my mind. d-is?oi-ted is how I see disjointed with the 'd' being almost entirely verbal and not really visualized. I then see 'is' entirely separately from 'oi' and 'oi' is separately seen from ted. Words normally only appear when I write them, and even then I am not absolutely certain whether they are correct. In fact some words go on looking 'wrong' even though my wife assures me I am correct.

Memory

I cannot 'remember' which way a switch goes on and off, no matter how many times I am told. To say left, and mean it, I must look at my left hand. I must do this to direct someone,

but there is a good chance that I meant right anyway. I can visualize position on a map or plan; it is actual movement to left or right, or visualizing same, that confuses. I find it difficult to name left by pointing or movement, even on the map where I know position as a spot in a visual whole. Coupled with this is an inability to remember, even after immediately doing it, which way I should turn a screw or nut. Likewise dance movements are a mystery to me.

I go a long way to avoid doing a mechanical task. I can paint pictures but not make a simple frame. My friends often have to help me out before an exhibition. .

My pictures I am told show great depth at times; I cannot see this pictorial depth at all. Even a piece of sculpture or a live tree are texture and colour without mass. Yet I can see depth and visually experience perspective, but normally they do not register themselves in my mind without concentration.

When I play chess I cannot visualize my move more than one, and, if I'm very lucky, two ahead. I must grasp my play from what I can actually see. I was (hower) however at one time champion of my grammar school. But obviously my progress was limited after that. I remember once beating a strong club player who foresaw checkmate in two - I confessed afterwards I hadn't. My response to the immediate was strong and therefore he had taken it for granted that my long term strategy was also as well founded.

When given an IQ test my verbal result mas 135. When given a test involving coordination my results dropped to 105. Taking part in a research project into nonsense syllables, I had very erratic results or should I say lack of results. I often verged on grasping a list, but no matter the number of repetitions I never did manage to visualize all the syllables before they appeared. If I concentrated on remembering a particular difficulty, I lost whole sequences I had previously remembered.

The syndrome dyslexia

'Word blindness' is not an exact enough substitute for my handicap. A total rejection that dyslexia exists is to say I and my difficulties don't exist in the form I experience them. If they are purely emotional, then when I'm upset my spatial

and visual difficulties should be intensified. (Therre) They're not. But I won't deny emotional unease when I (met) meet a difficulty. No one likes to fail at what seems a simple task, as in turning right when told to.

I suspect that flashing short test words and syllables on a screen ('tachy' something or other – I know it verbally) at varying speeds, could well reveal the haphazard visual handicap of the dyslexic more exactly. In testing a child with less sophisticated means, a marked contrast between verbal and performance IQ results should in most cases pick out the dyslexic child.

I am too closely involved to be able to recommend any remedial technique to help these children without bias. I feel that dealing with training the child in spatial relationships first, to avoid letting the child continue to build up too many emotional blocks resulting from confusing left with right might be the correct way of handling the problem. Spelling errors are something most children make at some time or other. A bad spelling is merely an extreme example of something socially acceptable amongst schoolchildren. Two left feet are a music hall joke which can see you out of step literally. Spelling can be helped by building up strong visual patterns in the mind, by emphasizing the links between short words and syllables. If the dyslexic can learn to spell most syllables correctly and can sound words, then most words can be spelt without being seen in the mind.

Reading not by wholes but by syllables covering up the rest of the word may at times help. 'Wan-der-ing' may not be put together visually, but can be put together verbally with practice. Not too much emphasis on reading aloud correctly, but rather more emphasis on following a passage 'silently' or reading by selves 'silently' may contain part of the answer. There are obvious checks that can be made as to whether the individual is making progress with 'silent' reading. 'Silent' reading involves the child more with getting the word into his own mind, rather than giving it verbally to the teacher. Silent reading also aids the child to obtain speed and comprehension.

My own reading now runs to 900 w.p.m. without much loss in comprehension and I can reach 1200 w.p.m. I like to think

Specific learning disabilities and their treatment

that some (dsy) dyslexic children can follow and overcome their handicap even better than I have.

40 Decoding for dyslexia

Lyn Wendon

For the child who is unsuccessful in learning to read 'naturally', the remedial teacher must cover as much as two, three or four years' lost ground as quickly as possible. Time is at a premium.

But remedial methods need time, and even may have to be preceded by a 'rest period' while the remedial teacher establishes rapport with the failing child and helps him to acquire a more positive attitude towards learning. The teaching of reading itself may need to be further postponed while visual and auditory perception is specially trained to counteract perceptual weaknesses contributing to the child's failure. Again precious time is involved.

My concern has been to evolve a remedial method which:

1. is sufficently different from schoolroom experience to engage the child's enthusiasm right away;

2. has built-in visual clues for children with poor visual

memory:

3. has built-in auditory clues for children with poor auditory memory;

4. incorporates familiar directional properties in the visual clues for children with poor left-right discrimination, or poor general ability in spatial orientation.

At first the approach involves no reading at all. Instead an exploration is begun into the way letters work and why.

All the letters of the alphabet are reintroduced in pictogram form. The pictograms are illustrations of letters incorporating parallel-shaped people, animals or objects within themselves. Unlike many old and familiar mnemonics of a similar type (e.g. d for drummerboy, with drum on left, or f for feather, drawn in an f-shaped curl, etc.), which only apply to single letters, the pictograms have been developed into a system which also represents a code for interaction of letters in compound phonic units. Usually failure to recognize compound phonic units of two, three, or four letters causes the real breakdown in most poor readers' progress. This is not surprising, since nearly all twenty-six letters are capable of completely altering their sound identity when placed in specific sequences. Normally the old parallel-shaped mnemonics cease to apply. In fact, because they are vivid and effective for teaching single letters, they can even interfere with the learning of irregularities, since the symbols remain the same shapes as before in spite of the fact that, through being grouped, their sounds change.

The pictogram mnemonics explaining the sounds made by the twenty-six single letters of the alphabet are chosen so that they remain valuable for explaining what happens when any two or more specific letters 'meet' (are placed side by side) in a word. Furthermore, the mnemonic for letter-shape is also designed to contain directional clues for children who are apt to confuse the symbol with its inverted or reversed image. For example, w is presented as w-for- Wicked Water Witch (see pictogram no. 1), so that children can see this letter as holding two pools of water. They cannot then confuse it with m, since water would run straight out of m's equivalent parts and the middle point would not provide a foothold for the Witch. The association with water also makes it clear to children how to write the letter (starting with this stroke \(\Lambda\)? or this \(\V\)?), since for W the turn of the stroke must serve as the bottom of one of the water-holding sections. Having written w correctly, the children colour in some water for good measure, in the practice stages, until they are ready to graduate to writing w without the visual and ideational prop. The same prop provides the sound-clue for w, at the beginning of the word 'water'.

The choice of mnemonic is important. A low IQ child of seven years learned p for pipe at school. Weak in spatial orientation, she frequently produced this, \triangle for p, remembering that p was shaped like a pipe but forgetting its upended







ABOVE: Examples of Pictograms for single letters of the alphabet.

BELOW: Examples of their use in compound phonic units. These are represented by Pictograms covering all the important irregularities encountered in reading.

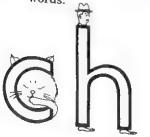








Children make their own versions of the Pictograms in words which they are having difficulty in reading or spelling. With the phonic unit highlighted by their own illustration of its sound clue, they then read, or spell, the word with symbols also makes it easier to notice the same grouping of symbols in other words.





position in the picture clue. The choice of sound clue is equally important. A common one for aw, for example, is saw, because a saw can be illustrated. But the sound clue is 'buried' in the word. Ideally the sound clue should always be at the beginning, unless it is a sound which only occurs at the end of words.

The h, to give another example, is introduced as a man wearing a hat, 'Mr Huh' (see pictogram no. 3). Mr Huh is seen to be moving in the reading and writing direction. (All the pictogram people and animals act as pointers by heading in the reading direction.) Mr Huh is barefoot because he hates noise. If he had shoes on, the sound of his footsteps would stop him from hearing the whispering 'hhhhh'-sound he makes himself.

How do mnemonics like these remain valuable when compound phonic units are introduced? How, for example, is whexplained? The answer is that when the Wicked Water Witch and Mr Huh meet in a word she hits him on the head so hard we can't hear him (see pictogram no. 4). The child who tries to read, for example, whip as 'wuh-hip' needs very few reminders that he must not pronounce the h when he has an amusing 'reason' of this kind to explain why you cannot hear this letter. Again, he draws his own illustration of the pictogram right on to large versions he makes of wh-words (as in the 'whale') to help fix the association.

How can other irregularities with w be explained? Since the sound of a, o, or e to the *left* of any w also causes irregularities (e.g. saw, owl, few, and hundreds of other words) the w may well be considered 'wicked'. The Wicked Water Witch in the pictograms personifies treachery in words. But once the child knows exactly what the Witch does to these vowels, the words containing aw, ow and ew hold no more treachery for them. For example, what happens when a and w meet in a word? (The letter a is introduced as ă-for-ăpple since so many children have already learned this familiar mnemonic, and unlearning is to be avoided where possible.) The same mnemonics for a and w can now explain the irregular sound in saw, etc., by illustrating the Wicked Water Witch turning back to make the apple taste 'awful' (see pictogram no. 5). The arbitrary sound-shift from 'a' and 'wuh' to 'aw', as in

'awful', is thus given an explanation which children can understand. If a child forgets the new sound made by a plus w, he only has to ask himself what happens when the apple is next to the Witch? The pictogram for aw provides a Gestalt (i.e. an organization of items in a meaningful framework), which prints itself in his mind, both as an idea and as a visual and auditory event. When a child fails to recognize that words like paw, or claw, or crawl, etc., look like and must, therefore, rhyme with a word he can read, like saw, and he has forgotten again what sound a plus w makes, a conscientious teacher is apt to prompt him with the sound, again and again, hoping that it will gradually stick in his auditory memory. But if his auditory memory is weak, endless repetition will be needed before this occurs.

If, instead, the child is reminded of what he already knows: that a normally says a-for-apple, and w normally says w for Wicked Water Witch, and if he is then asked what happens when the apple is next to the Witch in a word, he can reconstruct the sound for himself from the ideational link to 'aw' for 'awful'. If he still forgets, he can be shown the pictogram illustrating the Witch making the apple taste awful, again. He soon sees how he can find his own way to the 'aw' sound next time, especially when he has reinforced the association by drawing in the apple and the Witch on several words containing aw (as in the drawing, 'lawn'), and coloured the apple an 'awful-tasting' colour.

In conventional phonic teaching there is nothing in the shape of the letters themselves to provide the child with a clue to either an irregular or a regular sound he has forgotten. The association between any letter's shape and its possible sounds has to be a rote association, built up through drill in sounds or through the use of mnemonics which have no relationship to the letter shapes (e.g. a colour code, or pictures containing a parallel sound but not necessarily a parallel shape, or common words referred to, repeatedly, as key examples), but, again, without any built-in reminder as to which key word, colour or picture supplies the key sound the child might need at any one time. After all, when these visual or auditory props are used, they too must be remembered by rote association.

It is this rote association learning, normally considered an unavoidable aspect of teaching phonics, which has given most phonic methods a deserved measure of unpopularity.

The child who cannot remember isolated sounds must be given some means, within the letters themselves, of finding his own way to the sounds he needs. With pictograms the original values of these symbols provide the clues to the new sounds. Furthermore, the child who tends to become confused about the regular sounds made by the alphabet, while learning the irregular sounds they also make, is given constant review of the regular sounds, since now he actually needs them both for regular words and for remembering the new sounds made when the letters 'meet'.

Two further examples will illustrate. If ch and sh are constantly confused (a common difficulty among children who need remedial help), a framework is needed which will get rid of the interference these two similar digraphs create for each other. The pictogram for c gives this letter a shape-association with a cat drawn (as always) in a parallel shape (see pictogram no. 2), The s is presented as a snake, again, a common mnemonic. The explanation, then, for ch is that the cat sneezes every time she comes up behind her master, Mr Huh (see pictogram no. 6), because his woolly suit tickles her nose. (Since 'he' is the only letter who wears a woolly suit, and 'she' is the only letter with a sensitive nose, it is understandable that she only sneezes when she is next to him, but never when he is not there.) The snake, by contrast, is the fellow who goes around hissing in words. The other letters do not mind his hissing beside them in-words, but Mr Huh hates noise. So naturally when the snake comes up behind him he turns back crossly and says 'sh!'. He can be heard saying 'sh!' to the snake in every word in which the snake comes up behind him (see pictogram no. 7).

Once again the letters have been given an ideational link with each other related to both their shape and their sound. The 'personal', anecdotal information about the symbols, which come with pictogram presentation of phonics, makes the exploration into the way letters work an activity which children actually enjoy. They are soon searching keenly within words to spot animals, objects, enemies and friends, and

Remedial education: programmes and progress

looking out for special interactions between them.

Decoding symbols into sounds (that is, reading words) becomes akin to reading pictures, because now the symbols have come to look like 'skeleton pictures' of pictogram illustrations which the children have already understood, and learned to use as sound clues for both single and compound phonic units. Essential phonic information, presented through this structured mnemonic approach, is assimilated without the boredom and dragging pace usually associated with phonic work, and without the usual dependence on rote learning.

The method is best suited to children between six and eleven years with mild to severe reading and spelling disabilities, but has also been responsible for accelerated progress and complete resolution of reading failure with neurologically confirmed severe cases of dyslexia up to age thirteen.

41 The teaching of spelling

Margaret Peters

Spelling is a skill that inevitably provokes discussion among parents and uneasiness among teachers. For some parents the ability to spell is an overt sign that a child is 'getting educated'. For some teachers uneasiness stems from the fear that to demand good spelling may not only inhibit creative writing but savour of the formal teaching they have been taught to distrust. On the other hand many teachers are uneasy because they know that, without being pedantic, good spelling is necessary for communication. They also appreciate that a child or adult who can spell competently is free to write adventurously with no backward glances to see if a word looks right and no offering of a less precise synonym. The competent speller is a confident writer.

In order to see what teachers really do about teaching spelling and with what results, a survey has been made of spelling ability and progress throughout a whole age group in one local education authority. This was a sample of 846 children in the second to fourth year of the junior school. Details about the children themselves, their strengths and weaknesses, their advantages and disadvantages were noted, particularly in relation to their spelling ability at nine, ten, and eleven. Not only factors within the children themselves but those concerning the home and the school were isolated. But of greatest concern was what actually happened in school to induce or to retard progress in spelling.

First it was important to ascertain what children themselves bring to the learning of the skill, and then to discover what other factors contribute to improvement in spelling, particularly in those children who have not acquired the ability with ease. For as one headmistress put it, 'less able children tend to need "word drill" more than highly intelligent children who can learn to spell quite naturally'. If this is so, if some who can learn to spell quite naturally' yet at an early children acquire the skill, if not 'naturally' yet at an early

age without deliberate teaching, what factors have brought this about? What attributes and skills do such children possess and what conditions in the home have contributed to such ability in spelling?

What do children themselves bring to learning to spell?

In the first place it must be pointed out that, unlike in reading, there is no significant sex difference in spelling attainment. But there is evidence supporting the insight of the headmistress quoted above. For what most strongly influences spelling ability at nine is verbal intelligence. Irrespective of this however, it is how a child looks at words, his visual perception of word form, how well he can see a word and reproduce it, that is most important. Poor spellers find they can do this if they try, but they have just never challenged themselves or been challenged to make the attempt. It is, of course, the result of looking at words with interest, noticing likenesses and making associations. Apart from this, carefulness, as shown, for example, in a child's handwriting, seems to affect spelling. These are all characteristics within the child. But, surprising as it may seem, the careful writer tends to be the swift writer and swift handwriting is something that, other things being equal, favourably influences spelling, and swift handwriting is something for which the teacher and the school is clearly responsible.

It is only to be expected that the younger the child the more the *home* environment affects spelling ability. By home environment is meant not only socio-economic status, but whether a child is an eldest or only child rather than a middle or youngest, and whether he comes from a small rather than a large family. But by the time the child is eleven, his spelling ability is determined more by the teaching which he has experienced than by his home background. And then it is what the *teacher* does, most particularly in those who begin at a low attainment level, that matters

What do teachers do about spelling?

Let us now look at the teachers and what they do in relation to

spelling progress. There were fifty-six teachers in the sample, twenty-eight men and twenty-eight women, and the way they taught spelling was related to the progress of their classes.

It is quite clear from the evidence that progress in spelling occurs when teachers' attitudes are consistent, and when they themselves are rational, and systematic in their teaching. In fact dividing the classes in half, according to the ranked order of progress made in spelling, no classes in the top half had a really inconsistent, irrational and unsystematic teacher, and no classes in the bottom half had a thoroughly systematic and rational teacher. The question most often asked is: do children learn to spell best by learning from lists? The answer to this question is certainly 'Yes'! The top 25 per cent of classes in the sample all learned lists of some kind. So we must ask what kind of lists? This again is clear. If the lists are of words derived from children's needs (i.e. either words which the children ask for in the course of their free writing, or lists drawn up by the teacher from the kind of words that children ask for), there is significantly greater progress than if printed lists or no lists at all are used. One particularly valuable way in which a child can produce his own spelling lists is that suggested by Arvidson (1963). In the 'Alphabetical spelling list' prepared and published by the New Zealand Council for Educational Research, the frequency level of each of the words is indicated, so that children can see for themselves whether they ought to be able to spell the word they need without help. A child is expected to compile a personal learning list and if words entered are from a lower level than his current working level, these are to be underlined, thus providing automatic revision. 'The child', Arvidson writes 'should be encouraged to adopt a particularly determined attitude towards words that persistently give him trouble.' The onus is on the child in the learning situation.

The time spent on spelling is, of course, important, whether it is spent on list learning, instruction or testing. Indeed, individual differences between teachers inevitably produce very varied proportions of time allocation.

But neither the type of list used, nor the time spent on spelling is as productive of spelling competence as how the teachers teach spelling. English spelling may seem irrational but it has to be taught in a rational manner. This applies to how teachers expect children to 'do corrections'. Some demand that children should 'write each mistake out three times', others expect correction sequences – e.g. the children finding their own mistakes, looking up and writing them from memory. The difference in the progress of classes with rote as distinct from rational correction techniques is very marked, particularly in the third year (where most spelling progress in fact occurs). Three-quarters of the classes where most progress is made are taught by rational teachers who have worked out a way for their children to correct their mistakes autonomously, drawing attention, e.g. to the hard spots within the words and to the points where the child has gone wrong. Three-quarters of the classes where least progress is made are taught by

teachers pursuing rote correction techniques.

Another question frequently asked by teachers is: What is the value of testing spelling? In the survey it was seen that there is a one in eight chance of a teacher who does no testing seeing any improvement in spelling. As one would expect there is a significant correlation between the time spent on testing and the mean percentage progress of the class. To be of value, however, testing must be regular and systematic. Where children are learning lists of spellings derived from their own writing needs, this is a challenge to the teachers' powers of organization. It is not easy to test a large class regularly and systematically if all the children are learning individual lists. We can well be reminded here of the value of active selftesting as a learning technique. One way of exploiting this is in the context of learning to spell the words a child wants in order to express himself. Here the child tests himself by looking at the word to be learned, covering it up and writing it as a whole (without blindly copying), checking and repeating the procedure till he can write the word correctly without looking up in the middle (Peters, 1967). This is active selftesting which will be, to some extent, revision if he has already partly learned a particular word when it was first needed and asked for. Again the onus of learning is on the

But a teacher must be prepared to spare time for spelling and particularly for instruction. The teacher interested in words will point out the structure of words, for example comparing similar words, and he will help the children not only to make lists but to learn and test themselves with the words that they have asked for in the course of their free writing. He will not rely on printed lists which would seem to be detrimental to spelling progress, probably because the use of them absolves the teacher from any further responsibility in the matter of spelling.

Systematic teaching procedures

Let us return to the fact, touched on already, that it is on rational and systematic teaching procedures that improvement in spelling depends. One thing necessary if a child is to be able to spell is the ability to generalize. From knowing one word or string of letters in one word he can make a good attempt at a new and unknown word. This is extremely important if he is, as we hope, to write adventurously, confidently and creatively. This ability to generalize might be thought to occur 'in the process of maturation', and with minimal teaching. One school, therefore, was isolated where there had been no teaching of the skill and where corrections were exacted after written work in a rote manner. The spelling of the children in this school was compared with that of the population as a whole. In the whole sample of children receiving spelling teaching, however meagre, four times as many improved in generalizing ability as in the school where no teaching occurred, and this is only to be expected. But in this school where no teaching at all occurred, as many as 24 per cent of the children who were able to generalize at nine were no longer able to do so at ten years (eight times as many as the percentage in the population as a whole). Their techniques and strategies deteriorated. Undoubtedly, competence in spelling necessitates a qualitative change for most children as they learn to generalize from known words. This ability may coincide with the development of formal operational thinking, but it is clear from the evidence that such generalizing ability is dependent on rational and systematic

teaching procedures. In other words, children in the junior school years acquire and retain strategies in spelling if, and only if, they continue to receive instruction in spelling.

What are these acquired strategies, which are so essential to spelling ability? Of the characteristics within a child that are particularly predictive of spelling ability, apart from verbal intelligence, the three most influential are visual perception of word form, speed of writing and carefulness. Now carefulness may, to a large extent, be a personality trait, but in so far as it reflects, and is reflected in many areas, it is something teachers can expect and encourage. But the other two characteristics, visual perception of word form and speed of handwriting, which are both highly predictive of spelling ability, can be taught.

Spelling depends on visual, not on auditory imagery. To sound out a word is to court confusion. A phoneme in English can be represented by alternative graphemes. 'Stayed' could quite reasonably be 'staid' or 'stade'. To spell adequately one has to remember the visual form, and be able to reproduce it or to be able to generalize from a string of letters with which one is already familiar. If the child knows 'duck' he can make a reasonable guess at 'lick' or 'sock'. If he knows 'station', he can make a reasonable guess at 'intention'. This picking up of strings of letters that are likely to occur together, perhaps at the end of words, is not deliberately taught, but is acquired as the children are encouraged to look with interest at words. These words may be the children's own names (for what word can matter more to a child than the structure of his own name?) They may be the names of sweets, Mars, Smarties, Spangles, etc. They may be the words appearing in TV commercials words of interest to children (for though the reading age of TV commercials is somewhere about seven years, the interest age is five or less). Such words are deliberately exposed, and spoken aloud, and in television's compulsive setting are presented with maximum effect. Visual imagery can be formally trained, of course (Radaker, 1963) and this is of vital importance if children are to become competent at spelling

Teachers must also teach handwriting. It must be swift and effortless. It was surprising in the survey to find that those children who wrote swiftly also wrote carefully. It is a myth

that swift writers write carelessly. The swifter the writing the better the spelling. This is only to be expected, since the child that writes swiftly is accustomed to writing familiar strings of letters together and there is a high probability of certain strings occurring and recurring in English.

Swift writing reveals confidence in writing which, in children, is so very desirable. Such assured writing brings in its train a child's self-image of himself as a good speller. And this is the most important gift a teacher can give if he wants a child to be able to write unhesitatingly, without circumlocutions, and without backward glances to see if a word looks right. If a child sees himself as a good speller he is a good speller, and there is less and less need for the teacher to have to go to the lengths described in this article. If anything can short circuit the teaching of spelling it is teaching the child to look at words with strong visual attention, and with the intention to remember and reproduce. It is teaching him to write swiftly. Above all it is encouraging in him the assumption that he is 'on the way to being a good speller', for only then will he be a really confident, adventurous and creative writer.

References

ARVIDSON, G. L. (1963) Learning to Spell, Wheaton.

PETERS, M. L. (1967) Spelling: Caught or Taught? Routledge & Kegan

PETERS, M. L. (1967) Success in Spelling, Research Paper no. 4. Cambridge Institute of Education.

RADAKER, L. D. (1963) 'The effect of visual imagery upon spelling' performance', J. Ed. Res. 56, 370-2.

42 Teaching left-handed children

Margaret M. Clark

The aim of this article is to consider the present state of our knowledge on left-handedness as an educationally important criterion, to assess the extent to which recent research in this field has altered the implications for teachers of this phenomenon, and finally to consider the extent to which recommendations on the treatment of left-handers have been implemented in the schools in the last ten years. Over ten years ago a booklet for teachers entitled Teaching Left-handed Children was published by the Scottish Council for Research in Education (Clark, 1959). That publication, a shortened version of Lefthandedness, Laterality Characteristics and their Educational Implications (Clark, 1957), provided a summary of various aspects of work in fields where a connection with left-handedness was suspected, or had been found.

Incidence of left-handedness

A more permissive attitude to left-handedness has developed both in the schools, and on the part of parents. Few teachers would now enforce a change of handedness in a strongly lefthanded child. The author in her earlier studies found that most left-handed writers had gone through a period, about the age of seven, when right-handedness was 'encouraged', and lefthanded writing reverted to only after a failure to achieve an acceptable standard with the 'proper' hand. This practice has virtually disappeared. In a recent community study incidence figures based on 1,544 seven-year-olds showed a higher percentage of left-handed writers than was evident ten years ago (Clark, 1970). The present percentage in the county studied was 8-8 per cent. Interestingly enough the marked sex difference found in earlier studies has not diminished. It had been suggested that one cause of the marked sex difference in use of the left hand might have been the greater willingness of

the girls to bow to social convention and/or the higher degree of stubbornness of the boys. The difference still remains with 10.9 per cent of boys found to be left-handed writers and 6.5 per cent of girls. These findings of an increased incidence are in accord with other studies in the last ten years. The Scottish Council for Research in Education found that in the study of scholastic attainment carried out in 1963 that over the ten year period since the previous study, the incidence of lefthanded writers among ten-year-olds in Scotland had risen from $6 \cdot 8$ to $8 \cdot 2$ per cent in boys and $5 \cdot 1$ to $6 \cdot 7$ per cent in girls (SCRE 1963 and 1968). Pringle et al. in 11,000 Seven-Year-Olds (1967) quote incidence figures for left-handed children in England and Wales; their figures are, however, not based on writing hand as the criterion and are therefore not directly comparable (7.4 per cent for left-handedness and a further 12.7 per cent mixed). In the United States in a large scale study involving 92,656 children Enstrom (1962) found a similar pattern: namely a higher incidence of left-handed writers and a greater proportion of boys left-handed (total 11.1 per cent; boys 12.5, girls 9.7 per cent). Interestingly, Enstrom found no variation from grade one to grade six, and suggested that this was evidence that the permissive attitude over a period of time in the community which he studied had led to a stabilizing in the percentage of left-handed writers. It seems likely that the incidence may increase further in this country as it appears that the attitude of parents to children showing left-handed tendencies is not yet as universally accepting as that of teachers. A number of instances have come to the attention of the author where vigorous attempts have been made by parents to discourage use of the left hand in their children. Other instances have also been noted of children without perhaps very strong, but with nonetheless established preference for the left hand in writing, being confused by suggestions from their first teacher that they try the other hand. Thus clearly the incidence of lefthanded writers has increased, and now nearly one in ten children in our schools are likely to be using their left hand in writing. Are they being taught to use their left hand or merely permitted to use it? 317

Writing and left-handedness

Cole (1934) suggested, as have others, that at the time she was writing, though permission to use the left hand might be granted, instruction was not provided, and left-handed children were subjected to inappropriate methods of instruction in writing. Happily, the plain pen with a fine sharp nib dear to the hearts of teachers of penmanship, and so inappropriate for left-handed writers, who push rather than pull their pen across the page, is a thing of the past as are the ink wells on the 'wrong' side of the desk and the dirty ink they contained. So much on the credit side. To what extent is handwriting taught and if so, to what extent are appropriate adjustments suggested for the left-handed writers? The less formal, freer writing styles present fewer problems to the left-handed writers as a precise angle of forward slope is seldom insisted upon. But beyond that, does legible writing at speed form a part of the curriculum? Seldom is any account taken of the particular illegibilities in an individual child's writing and an attempt made to counter them as they appear. Individualized instruction would be the only appropriate method of dealing with this in view of the range of possible causes of illegibilities. The negative correlation between extent of use and standard of writing in the adult population would argue for the inappropriateness of the school instruction as failing to provide children with a speedy but legible script which will cope with their needs in adult life. Simple adjustments for the left-handed child suggested in Cole (1934) and Clark (1957 and 1959) and in various manuals on handwriting, are seldom to be seen. The present author is concerned at how few left-handed writers are given any guidance on writing, and how many are even prevented from making the appropriate adjustments which would enable them to write in a free, less tiring manner. How many college courses discuss these aspects of writing with their students? Many, if they mention left-handedness, mention it coupled only with reading difficulties and reversals, in which areas the statements in earlier textbooks have not been substantiated in recent large-scale studies.

Reversals

Reversals of letters are common in the early stages of learning to write, both with left- and right-handed children, and are indeed an understandable confusion until the child appreciates the importance of orientation and sequence in letter and word identification. One problem about the Look and Say approach to teaching reading is that the child does not necessarily have the left to right sequence of words fully impressed upon him. Some teachers supplement their whole word or sentence approach with systematic phonic analysis; some children deduce this for themselves. For others, reading does not proceed beyond the 'look and guess' stage. The motor coordination necessary to copy a diamond was shown by only 31.8 per cent of a sample of 1,544 children at the age of seven years in a recent community study. All but a quarter of the children in this study made some confusion of right and left in a simple test of ability to differentiate right and left in themselves and others (Clark, 1970). In the light of these findings of the limited motor coordination and limited ability to differentiate right and left of many children, not merely left-handed children, it is important that attention be drawn to the shape and orientation of letters and the sequence of words, at least with those who show any confusion. In their desire for free writing in the early stages, few teachers seem to indicate to children the appropriate direction in which to form letters. Some guidance could well be given before an awkward way of forming letters has become established. It is worth considering, for example, the most successful way to write b and d to avoid confusion and to prepare for a transfer from print to script. The child who is in any doubt about the shape or direction of letters would be better with a copy of the letters and numbers to which he could refer. Further, it is easier for a child to copy from his personal model than it is for him to refer to one at a distance on a wall. Any child, be he left- or right-handed, who has difficulty in remembering the direction or orientation of letters should be assisted so that he is prevented from seeing frequently repeated wrong versions in his own writing which will only add to his confusion. In the study referred to above, there was no evidence that reversals were commoner in lefthanders who were backward readers than in right-handers of the same level of intelligence.

Mirror writing

'Mirror writing', that is, writing which progresses in a right to left direction across the page, is commonly associated with left-handedness. Many naturally left-handed adults converted to right-handedness can produce mirror writing with ease with their left hand as did Leonardo da Vinci and Lewis Carroll (see Clark, 1957, for illustrations of this). Though reversals of letters and reversed letter order are common in the early stages in left- and right-handed writers, and continue in backward readers whether left or right-handed, mirror writing seems to trouble mainly left-handed writers, or to be accurate, to concern the parents and teachers of left-handed children. Mirror writing can, however, soon be prevented if the left to right sequence in writing is indicated to the child and a mark placed at the left hand side of the page where he should start writing, as mirror writing is produced in a leftwards direction. Both reassurance to the parents and guidance to the children seem to be required.

Warnings about the dangers of forcing a change of writing hand were at first coupled with the suggestion that there was a direct association between either left-handedness and stuttering or changed handedness and stuttering. In 1964 the results of a community study in Newcastle upon Tyne of eighty stutterers aged nine to ten years of age and a control group gave no evidence of an association between stuttering and either left-handedness or changed handedness. The early claim of a direct association between left-handedness and a dominant right side of the brain has not been supported in more recent work. Though this may sometimes be the case, it does not appear to be the invariable association which earlier studies

had implied.

Left-handedness and reading difficulties

None of the recent large scale surveys have given support to the view that there is an association between left-handedness and delayed progress in learning to read (see Clark, 1967). Hillman (1956) in Durham County, found no evidence of different levels of reading ability associated with left-handedness, doubtful handedness or crossed laterality of hand and eye in children leaving the infant department. No association was found in the Isle of Wight survey (Rutter et al., 1970). Similarly, in their longitudinal study, Douglas et al. (1967) found no evidence that any aspect of laterality was predictive of school attainment. On spelling, Peters (1967) found that the left-handed children in her sample were not significantly poorer than the right handers, and stressed the importance of tuition as a determinant of spelling progress. In the community study by the present author there was no evidence of a difference in reading level between children who were lefthanded or left-eyed and their right-sided companions (Clark, 1970). Balow (1963) found that 'having the dominant hand and eye on the same side of the body, on opposite sides of the body, or having mixed hand dominance has no significant effect on reading achievement in the first grade' (p.326). It would seem, to quote Balow again, that 'lateral dominance screening of children at the beginning of the first year will not provide the teacher with information which will help her spot those children who are likely to have difficulty in learning to read' (p.328).

With regard to left-handedness in backward readers as distinct from community studies, there has been a great deal of discussion of a higher incidence of left-handers among these groups, and of a tendency or reversal errors in such children. The evidence seems to be that in the more carefully controlled studies left-handers do not predominate in groups of backward readers. In assessing any such study the following points

1. More boys are backward readers than girls; the more severe should be borne in mind: and prolonged the backwardness, the greater the excess of boys. More boys are left-handed, therefore a higher incidence of left-handedness would be expected even were there no connection between handledness and reading. Thus the comparison must be between backward readers and community incidence figures for the same sex.

2. The incidence of left-handedness varies from one com-

munity to another and according to the criterion used. Again, the comparative figures must be from the same population and on the same criterion.

3. The incidence of apparent left-handedness is increasing; therefore dated incidence figures must not be used for such a comparison, or again there may be an apparent excess in the backward readers.

4. The incidence of left-handedness varies with age; therefore comparisons are only justified when the groups are of the

same age.

5. There is the possibility that reading difficulty associated with left-handedness may be a referring criterion to certain centres. Naturally, in this case, a higher incidence of lefthandedness is to be expected and must not be taken to indicate a general association between the two phenomena.

It may be that there is an association between left-handedness or doubtful handedness and severe reading disability but such cannot be substantiated unless the above criteria have been met. In his book Patterns of Impairment in Specific Reading Disability, which is a study of cases of severe reading difficulty, Doehring (1968) found no evidence that lefthandedness was of significance.

The publicity that left-handedness has received in the last ten years has unfortunately not been such as to alert teachers to the needs of children who have difficulties, and sometimes prolonged difficulties, with reading and spelling, and who are, in some cases also, left-handed, but rather to lead to an assumption that such difficulties are confined to left-handed children and necessarily associated with this. In the light of recent research it seems important that a more positive attitude to teaching left-handed children be adopted, coupled with a less fatalistic attitude to poor writing and to reversals and other 'bizarre' spelling errors.

References

ANDREWS, G. and HARRIS, M. (1964) The Syndrome of Stuttering, Clinics in Developmental Medicine no. 17, Heinemann. BALOW, I. H. (1963) 'Lateral dominance characteristics and reading achievement in the first grade', J. of Psychol. 55, 323-8.

CLARK, M. M. (1957) Left-handedness: Laterality Characteristics and their Educational Implications, Publications of Scottish Council for Research in Education XXXIX, University of London Press.

CLARK, M. M. (1959) Teaching Left-handed Children, Publications of the Scottish Council for Research in Education XLIV, University of

London Press.

CLARK, M. M. (1967) 'Laterality characteristics and reading', Reading. 1.3, 3-9.

CLARK, M. M. (1970) Reading Difficulties in Schools, Penguin.

COLE, L. (1934) Psychology of the Elementary School Subjects, Farrar & Rinehart.

DOEHRING, G. (1968) Patterns of Impairment in Specific Reading

Disability, Indiana University Press.

DOUGLAS, J. W. B., ROSS, J. M., and COOPER, J. E. (1967) 'The relationship between handedness attainment and adjustment in a national sample of school children', Ed. Res. 9.3, 223-32. ENSTROM, E. A. (1962) The Extent of the Use of the Left Hand in

Handwriting, J. of Ed. Res. 55, 234-5. HILLMAN, H. H. (1956) 'The effect of laterality upon reading ability', Durham Research Review, 7, 86-96.

PETERS, M. L. (1967) Spelling: Caught or Taught? Students Library of

Education, Routledge & Kegan Paul. PRINGLE, M. L. K., BUTLER, N. R. and DAVIE, R. (1967) 11,000 Seven-Year-Olds, Longman.

RUTTER, M., TIZARD, J., and WHITMORE, K., eds. (1970) Educa-

tion, Health and Behaviour. Longman.

SCOTTISH COUNCIL FOR RESEARCH IN EDUCATION (1963) The Scottish Scholastic Survey - 1953, University of London Press,

SCOTTISH COUNCIL FOR RESEARCH IN EDUCATION (1968) Rising Standards in Scottish Primary Schools 1953-1963, University of London Press, pp.84-5.

The remedial teacher and the immigrant 43 child

Joti Bhatnagar

The last decade has seen a very large and dramatic increase in the number of immigrant children in British schools, from an estimated total of less than 5,000 in 1965 to over 150,000 in 1969. Inclusion of all immigrant children under one category sometimes creates a false impression of homogeneity while in fact there is a very wide variation indeed in their racial, social, and educational backgrounds. Some of these children are generally treated as whites while others as non-whites, some come from urban areas others from rural districts, some come from relatively industrialized areas others from pre-industrial agricultural regions, some have had excellent schooling before arrival here and others have had none at all. The problem of catering for these children in a system of education which was quite unprepared to receive them has proved to be an extremely difficult one. Add to this the emotional overtones of race relations and one has all the ingredients of a highly explosive

Dependants followed

The arrival of a large number of immigrants between 1958 and 1962 was bound to be followed by the arrival of a large number of their dependants. In the perspective of 1970 it seems almost incredible that this was not foreseen by many LEAs. As a result almost all local education authorities made ad hoc arrangements for coping with the sudden increase rather than planning in advance to meet what should have been a reasonably predictable situation. Only when the situation reached crisis proportions were any attempts made to analyse and tackle the problems in a coordinated fashion.

It is difficult to believe that despite the presence of over 150,000 immigrant children in British schools, no college of education with the single exception of Edge Hill, includes a

course in the 'Teaching of immigrants' as part of their normal . teacher training programme. Immigrant children with their different linguistic and educational backgrounds pose complex and difficult problems in the assessment of their educational potential. Most headmasters and other educational administrators have taken the easy way out through employing the traditional intelligence and attainment tests. Needless to add that most immigrant children immediately qualified for the remedial form. In the last analysis as far as the education of immigrant children is concerned, in most cases, it is the remedial teacher who has been left holding the baby.

Tapper and Stoppes (1963) in the East End of London, Robin (1965) in the Midlands and Bhatnagar (1970) in North London all found similar racial composition of the various streams. 'A' stream was nearly all white while the remedial stream mainly chocolate coloured. If the immigrant children in the remedial form so composed are not being neglected the English children certainly are and vice versa.

It is not the purpose of this article to discuss the rights and wrongs of the organization set up in the education of immigrant children. It does seem probable that for some years to come the remedial streams will continue to receive a disproportionate share of immigrants and that the remedial teachers will have to play a leading role in their education. It would appear that the remedial teacher will need to have both educational and social goals in view when planning courses for the immigrant child. The social goals in many cases would perhaps require his most urgent attention.

Remedial classes and immigrant children

The reasons that brought an English and an immigrant child into a remedial form might be quite different. The former will probably be sent there for his limited capacity for learning in an ordinary classroom, for his unsatisfactory attainments and occasionally for behaviour problems. The immigrant child in the remedial form, on the other hand, is likely to possess the cognitive apparatus necessary for him to make satisfactory progress in an ordinary classroom. He is likely to be there because of his language problems, bad learning habits acquired

earlier, and maladjustment. In most cases the help and assistance needed by these children is of a very different order than what is required by English children. The Plowden Report (1967) in its chapter on immigrant children has put the problem in a nutshell.

[The immigrant children] have often been abruptly uprooted, sometimes from a rural village community and introduced, maybe after a bewildering air flight, into crowded sub-standard housing in an industrial borough. This happens to European immigrants from Cyprus, Italy or Eire, as well as to the Commonwealth immigrants from the West Indies, parts of Africa, India or Pakistan. When the immigrant is Hindu or Muslim, and has special religious or dietary customs, difficulties for both child and teacher increase greatly. The worst of all is that of language. Teachers cannot communicate with parents; parents are unable to ask questions to which they need to know the answers. It is sometimes impossible to find out even a child's age or medical history. Opportunities for misunderstanding multiply.

For many children who have been the members of the majority community all their lives, transformation into membership of a minority community is a traumatic experience. For the first time in their lives many children are confronted with a social situation in which their parental standards, language, customs and traditions are despised. Racial discrimination and prejudice are words not in the vocabulary of most immigrant children before arriving in the alien land. The evidence suggests that the problem of 'black English' children (children born here of immigrant parents) who were born and brought up in this country are not dissimilar. In a large-scale study of immigrant schoolchildren in Sparkbrook, Williams (1966) noted that the process of growing up in England presents some extremely difficult problems for the immigrant children. The community as a whole, or at least their peer group, look down upon their parental standards. The values, aspirations and the role relations of parents often stand in sharp contrast with the prevailing norms. The role models offered by

the white majority, on the other hand, are often unobtainable either through discrimination or through parents not willing to allow their children to adopt completely alien patterns. The immigrant child is thus confronted by two contradictory social and cultural patterns and is expected to adjust to them both. Collins (1957) feels that until adolescence the home culture holds sway but with pubescence the peer group becomes increasingly important and the social and cultural values of the host society become the dominant influences. On the other hand the interviews with young adolescents published in the Observer (10 September 1967) point to the other direction. The interviewees appeared to reject the values and mores of a society which largely rejected them. In any event, the immigrant children are likely to experience considerable insecurity, anxiety and uncertainty about their role. The indepth analysis of the adjustment of immigrant children by Bhatnagar (1970) appears to confirm this view. Conflicts of this kind are psychologically very uncomfortable and different personalities react to this pressure in different ways. Juvenile delinquency is one of the ways in which the frustration against society finds expression. Unless some preventative measures are taken immediately, there is every likelihood of the incidence of juvenile delinquency rising sharply among the immigrant population.

Some have argued that a disproportionate number of immigrant children are to be found in remedial streams simply because of their 'lower education potential'. Arthur Jensen (1969) published an article in Harvard Educational Review (which set the educational world ablaze. He argued that (a) which set the educational world ablaze. He argued that (b) intelligence tests do in fact measure intelligence, (b) intelligence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined to heredity and (c) difference gence is determined mainly by heredity and (c) difference gence is determined to heredity and (c) difference gence gence is determined to heredity and (c) difference gence

in the subsequent numbers of Harvard Educational Review. It is quite obvious that a vast majority of psychologists and educationalists feel that his article was rather one-sided, failed to discuss some extremely relevant evidence which did not support his conclusion and that the issue is far more complex than Jensen would have us believe. A prominent British psychologist, Philip Vernon, who during the last few years has done more cross-cultural intelligence testing than probably any other psychologist in the world, has arrived at a very different conclusion. Traditionally psychologists have maintained a clear cut distinction between 'intelligence' and 'attainment' tests. While the former measures 'potential ability' the latter is dependent upon learning and educational environment. Vernon (1968) maintains that the distinction between intelligence and attainment tests is fallacious in the sense that both depend upon learning and are therefore attainment tests.

It might seem, then, that when teachers ask about the potential ability of an immigrant pupil, we should answer that there is no scientific means of finding out, and that their best bet is to watch how the child progresses as he begins to pick up standard English and to settle in to school. But this is obviously rather unfair since the initial progress he makes depends so much on what kind of help the school is able to give, and on whether home circumstances are favourable or not. . . . In addition, the whole situation of testing is likely to be unfamiliar in some of the ethnic groups from which immigrant children come. The tester may be a stranger of a different race and this arouses anxiety or suspicion. The child may be asked to solve a difficult problem on his own, and do so as quickly as possible. In some societies competitive initiative by individuals is discouraged; difficult problems should be discussed by the elders of the tribe; and one should not do anything hastily - there is no pressure of time in agricultural economies. We seldom realize, when testing English children, how dependent we are on the previous training they have had in test-like situations at school;

that they have got used to trying to answer silly questions quickly because the teacher says so. The immigrant may lack this background and fail, not because he is mentally incapable of coping with the problem, but because the way it is given is unfamiliar.

The importance of non-cognitive factors in determining the immigrant child's performance on intelligence tests has been demonstrated by Peter Watson in his recent article in New Society. Watson cites a study of immigrant children's performance on intelligence tests. When the experiment was described to the children as an exercise in planning the curriculum their IQ turned out to be ten points higher than when the experiment was described as an attempt to measure IQ. Furthermore, the intelligence test scores showed a tendency to climb when the test was administered by 'a very black West Indian Negro'.

Teacher training

Lack of training in appropriate teaching methods is another hurdle in the way of education of immigrants. Most remedial teachers were trained to deal with English children who, for one reason or another, were having learning difficulties. Recently it has been realized that the major function of the remedial teacher may well lie in the understanding and alleviation of the social and psychological rather than simple cognitive problems of children. Nevertheless, the social and psychological problems of immigrants differ considerably from those of English children. A recent report of the Community Relations Commission (1970) notes that about 30 per cent of the colleges of education are now providing courses in the education of immigrant children although these courses are not part of the basic teacher training programme yet. However, research into the development of special teaching techniques, teaching aids and equipment has hardly got off the ground. The thinking has been that since immigrant children wish to enter an already existing system, they should make all the necessary adjustments. The fact that they might need a different kind of teacher-pupil relationship, teaching methods

and orientation, has been largely ignored. Research in this area is urgently needed.

The initial reaction of the education authorities was to deny the existence of any 'immigrant problem' and to attempt to sweep the issue under the carpet. Hawkes (1966) in his book on immigrant children in British schools remarks: 'Because of the atmosphere which tends to surround the immigration issue in this country, the very act of facing up to the need for special teaching has seemed like a sort of disgrace.' For example, in 1965 the Assistant Education Officer, Inner London Education Authority, told The Times Educational Supplement that despite the presence of over 40,000 immigrant children in Inner London schools there was no 'immigrant problem'. The 'immigrant' problem, he claimed was 'very largely the creation of journalists on the lookout for sensational copy'. In the absence of official action, rumours begin to circulate among parents, both immigrants and English. For instance, it has generally been assumed by many parents (and for that matter by many teachers) that presence of a large number of immigrant children in a school generally depresses its academic achievement. A study by Little et al. (1968) in Inner London Education Authority schools failed to detect any difference in the performance of English children in schools with a high and a low proportion of immigrant children. No evidence was found to support the belief that academic standards are necessarily lower in the school with a substantial proportion of immigrant children.

For many immigrant children the teacher will be the main resocializing agent. He might in fact be the only English adult with whom the child has an extended interaction. It is in the classroom that he is likely to have his first intimate and personal interracial experience. The teaching of racial tolerance will probably occupy a central role in the social aims of a remedial programme in a multiracial classroom. A review of the methods and techniques of teaching racial tolerance has been published elsewhere (Bhatnagar, 1970).

When one considers the remarkable lack of expert assistance, teaching material and training, the remedial teachers have done an outstanding job of providing educational

experience to the newcomers. The fact that few immigrant parents appear to have complained about the educational provisions for their children is mainly due to the ability of the teachers to innovate, improvise and have a sympathetic understanding of the problems of a lonely child in an alien land. One can only hope that the education authorities soon provide the massive help and assistance so urgently needed.

References

BHATNAGAR, J. K. (1970) Immigrants at School, Cornmarket Press. BHATNAGAR, J. K. (1970a) 'Teaching racial tolerance', Race Today, 2, 171-3.

COLLINS, S. (1957) Coloured Minorities in Britain, Lutterworth Press. COMMUNITY RELATIONS COMMISSION (1970) Education for a Multi-racial Society, London, Community Relations Commission.

HAWKES, N. (1966) Immigrant Children in British Schools, Pall Mall. JENSEN, A. (1969) 'How much can we boost I.Q. and scholastic achievement?' Harvard Educational Review, Winter 1969.

LITTLE, A., MABLEY, C. and WHITAKER, G. (1968) 'The education of immigrant children in Inner London primary schools', Race, 9,

PLOWDEN REPORT (1967) Children and their Primary Schools, HMSO. ROBIN, C. E. (1965) 'Handling the immigrants: English classes at Smethwick', The Times Educational Supplement, 1 January 1965.

TAPPER, C. and STOPPES, E. (1963) 'Educating the immigrants', East

VERNON, P. E. (1968) 'What is Potential Ability?' Bulletin of the British Psychological Society, 21, 211-19.

WILLIAMS, J. (1966) 'Immigrant children: school's role in integration', in J. Rex and D. Moore, eds., Race, Community and Conflict, Oxford University Press.

A class for adult illiterates

Alan Livingstone

The class has been in operation for approximately five years. I have been teaching there for two and took over its organization only recently. We hope that the service we offer minimizes the gap left between the facilities provided in further education of mentally handicapped adults and those available for adults studying for GCE certificate. We provide for the needs of four main types of student:

1. those of below average intelligence, some of whom are registered mentally handicapped who are at pre-reading stages and initial reading stages;

2. those of average and above intelligence who, for a variety of reasons, have failed to read or have failed to reach a standard of reading equal to their potential and intelligence;

3. those of varying abilities who have reached an adequate reading standard but who have failed to spell correctly

on a level equal to their literacy;

4. school leavers from slow-learning educational establishments and remedial departments in ordinary secondary schools who wish to continue with their efforts generally to improve their standard of English.

The minimum age of acceptance to our class is sixteen, or fifteen in special cases. Our greatest problem currently, and this may be common to most adult illiteracy classes, is the lack of financial support from the county or the local borough. We receive no grant. The class however is staffed with professionally qualified teachers who receive a salary. No transportation is available for picking up disabled students. However both the staff and the students with transport are willing to offer their services, but a few of our disabled are unable to attend the class regularly through lack of transport. I have recently decided to arrange some voluntary help to visit these students in their homes.

The ratio of staff to student is 1:10. Currently we have thirty-five students and three staff. All our staff at the moment are in some branch of special education and all specialize daily in the teaching of reading. But this, though an advantage, need not be a necessary requirement. What is needed particularly in this field is an understanding, open minded approach. The teacher in this situation must remember that he/she is dealing with adults not children. Some teachers in this teaching situation often have difficulty differentiating. Where one method fails another must be tried, and another, and perhaps yet another, until success is achieved. If all fails then the teacher must be prepared to search for new methods hitherto unknown to him and try again.

People ask about what essential equipment is needed before setting up a class. In our own situation it is we, the staff, who are the essential equipment. As I have already said we lack finance. We gratefully received a grant of £15 from Eton College Charities. It was a welcome gift. We have had occasional parties and dances to raise money. But if we do make anything it invariably goes towards more social functions for our socially deprived students. We are now having to ask our better-paid students to buy their own books. There is no reason why they should not as they receive tuition free. However we have many students who are on social welfare, and these could not be expected to afford to buy their own books and equipment. Some of our students, bless them, have made donations of writing books and writing materials.

We have had at our disposal the use of the equipment in a day remedial reading centre. When the unit moved its premises we were asked to make alternative arrangements. We were given no adequate reason for this request. Therefore access to SRA, ESA Clifton Audio Visual Reading Programme, Stott's Programmed Reading Kit, Tansley Sound Sense books and other phonic programmes and a variety of reading schemes, was abruptly withdrawn. We now have only what we can beg. I am opening another class in another area of the town with very little equipment. Fortunately we have understanding students who are willing to assist as much as they can. One has kindly donated a typewriter. Students utilize their own tape recorders.

Our students are referred to us by a number of agencies:

- 1. Social workers, particularly in the field of mental health.
- 2. Headteachers of secondary schools and ESN schools.
- 3. Occasionally the educational psychology service in the area has referred school-leavers to us.
- 4. Some students come from adult training centres for the mentally handicapped. Usually the ones who are able to get about on their own and are now holding down jobs in factories.
- 5. The Youth Employment Office.
- 6. Samaritans.
- 7. Advertising, and generally by word of mouth.

Diagnosis is extremely important in assessing the reasons for reading failure. The testing system we use is standard I'm sure, but the knowledge of which seems to have been denied the averaged teacher.

We test under ten headings:

- 1. Haptic
- 2. Kinaesthetic
- 3. Visual discrimination
- 4. Visuomotor coordination
- 5. Visual memory
- 6. Auditory sequencing
- 7. Kephart visual achievement forms
- 8. Lateral dominance and directionality
- Eye control
- 10. Motor coordination.

Also where possible we take a reading performance check, word recognition test, letter recognition, phonic recognition, phonic ability, word attack, comprehension, spelling.

The class is run with the needs of the individual to the fore. The only group teaching done is small phonic and spelling groups. Primarily we aim at building up the confidence of the student in order to create a favourable situation. Often this is difficult task as so many have faced failure following failure. We have found that many gain some hope from seeing people

with problems more acute than their own. About 7 per cent of our students fail to make any progress. These may be students with severe brain damage, or in one case a student whose belief in his own inadequacy we have yet to eradicate. We welcome volunteer helpers to hear people read and to join in general conversation. We do not encourage our helpers to teach lest they should reinforce unwittingly the patterns of failure and inadequacy already deep rooted in many of our students. However where a relationship of trust and mutual understanding has developed between a helper and a student we may then instruct the helper in a particular method. We always explain the aims of the class and the problems of the students to our helpers but insist naturally that they should be all treated as fully developed mature adults. Conversation is encouraged between students, and the staff and helpers, where it arises naturally. Conversation is an invaluable recreation especially in cases where general mixing with other people has been avoided to minimize social embarrassment. Many of our helpers are from local grammar schools or from Eton College sixth forms. We encourage them to converse on current affairs, political and industrial. Many of our helpers have said that they themselves gain much from these conversations. We allow helpers to stay with those students towards whom they have a natural affinity.

Each teaching session lasts two hours. The atmosphere is relaxed and casual and students apply themselves to work when they wish. There are no repressive restrictions as exist in some school learning situations but students not engaged in work are discouraged from disturbing those who are. At our previous location we had a choice of rooms, all large and it was possible for a variety of activities to take place, noisy or otherwise. Now however we have had to adapt to a smaller confined space. We used to look upon ourselves more as a club than a class. Our students liked the idea. However it is a little more difficult to run it this way since we have been confined to one room. Some of our younger members may have a short game of football in the playground, during summer sessions. We also have a coffee break. Students arrange social functions themselves.

Remedial education: programmes and progress

All class problems are discussed as a group activity. We try to be therapeutic, to encourage self respect, confidence, individuality and self awareness and at the same time develop an ability to work and develop in a social group and to help one another where we can. Many people are impressed by the happy friendly atmosphere in the class.

Remedial education in action

45 A case of severe learning disability Gill Cotterell

Keith came to the Word Blind Centre when he was twelve years eight months old, after attending a tutorial unit three times a week for six years. Here Keith said he had 'played' and 'learnt nothing'. He had never received individual help before, though an attempt had been made to teach him to read by ita. At his comprehensive school he was still being taught

Keith was of average build for his age, not a lively chatterhis alphabet, which he knew. box, but lethargic in manner. His speech was quiet and indistinct, his articulation poor. He found difficulty in expressing

his ideas clearly, and having a poor automatic use of language, his answers tended to be monosyllabic. He always looked happy as he had developed a nervous grin over the years, and the L the boys at school teased him about this. Beneath it all Keith was keen to learn to read and write as he was considered stupid by his friends. At school he felt himself to be a total failure

failure and the only things he enjoyed were football and metal-

When I inquired in his first lesson whether he had ever made his own book, he said he had during the first year at primary school, but not since then. He was keen on the idea that he should make a book with my help during his session with with me twice a week. In fact, so keen was he to do this that he arrived at his second lesson with a new ring file full of paper that he had purchased for this purpose, without being asked to do so. It was evident that he was already motivated in the learning situation even after years of failure, so work could be embarked on straightaway. Rapport was not difficult to establish.

Keith cooperated as well as he was able during lessons, only occasionally forgetting to bring back a book or drawing. Concentration for any length of time was not easy at first, and because of this it was important that the lessons should contain a variety of activities to maintain his interest. By degrees small successes built up his confidence. It always seemed to me as if the boy had never had to think out a word for himself for a very long while, as his whole thought process was so slow. It was as if his brain had rusted with disuse. As time went by his span of concentration increased as he became more involved in the total learning situation. After periods requiring great mental effort on his part he yawned with exhaustion, though he was fully interested in the matter in hand.

From time to time Keith talked about his friends at school. He was one of a gang and tended to be easily led. This brought him into severe trouble later. Out of school he liked playing

football with his friends and watching television.

Keith was one of the severest cases I had to deal with at the centre, though his learning difficulties were similar to others I had already encountered, but they were all younger. The approach I used in teaching him resulted from my previous experience with severe auditory dyslexics. Keith attended the centre for two forty-five minute sessions a week.

Specific learning abilities and disabilities

1. A particular weakness in auditory memory. On the Illinois Test of Psycholinguistic Abilities (ITPA) Auditory Vocal Sequencing Test he scored at the 5 year 1 month level. He could not name the months of the year, or the sequential order of the alphabet, although all the individual letters were known to him. To Keith these were meaningless symbols, and he could neither analyse nor synthesize words into sound units

2. A poor automatic use of language. The ITPA revealed a language age of 8½ years. He confused his tenses, e.g. 'You teached me that the other day'; 'I drawed a footballer'; 'I just seen them'.

3. Some weakness in auditory discrimination. He confused the sounds 'a/u', 'a/e', 'b/p', 'f/v'. He usually pronounced his name 'Keif'. Occasionally words were pronounced in-

correctly, e.g. 'trodical' for 'tropical'.

4. Rhyming - one word could not be given to rhyme with another, so each word was to him a unique entity.

5. Reversals - 'b/d', 'b/p', 'd/p', and names of the letters 'y' and 'u' were confused. The only digraphs he knew were 'oo', 'ee', 'th', and 'sh'. He could not deal with double consonants at the beginning or end of words. All this was recorded on my 'check list of sounds'.

6. Visual recall was stronger than auditory recall though there was some degree of weakness here. On the Schonell R7 Visual Discrimination test he retained eleven-thirteenths of the words correctly. This was particularly good when he could not read any of the words to assist recall. On the ITPA Visual Sequencing Test he scored at the nine-year

7. Handwriting - immature, small printing, spattered with capital letters. Keith wrote slowly, gripping his pencil tightly. He misformed 's', 'n', 'e', and did not know how to form a small 'f', always using the capital letter. To make a 'g' he made a 'j' and then went back and put a 'c' at the front upon completion of a word!

8. The only words that Keith could confidently write were 'and', 'it', 'is', 'the', 'London', 'Mum and Dad'.

Performance in reading, writing and spelling at the beginning of tuition

Schonell GWR - 5y 7m Schonell GWSp - 5y 8m

WISC V.Q. 85, P.Q. 90

Neale - Accuracy RA - 6y 5m

Rate - Below norms

Comprehension - 6y 3m

Fig. 45.1 shows a sample of ten minutes of free unaided writing done by Keith on entry to the centre. It reveals his poor understanding of the sound symbol system of language. He is only able to get the first letter of a word correct. Unsure of the direction of a small 'b' he uses the capital letter for safety. There is little evidence here of his tendency to visual retention.

Teaching techniques used

Because Keith had such extreme difficulty in retaining words it was necessary to use a multisensory approach to build up his own basic vocabulary initially. Not dependent on phonics, the Fernald kinaesthetic whole word technique was used. The only words learnt were those required in his topic book, so that learning was meaningful. Gradually a few unknown words were linked to the known words, usually containing the same visual sound pattern. It was important to remember that the shape of words was likely to have more meaning to him than the sound at this stage.

After drawing a motorbike in considerable detail Keith learnt 'motor' and 'bike' in his first lesson, using the Fernald method. These two words were tested next time, and after 'motor' had been correctly written on the blackboard, I challenged Keith to write motors, motoring, motorist, motored and motor car. This was partly to overlearn 'motor' and partly to test his ability to add simple endings. Instant achievement and success with long words was encouraging for him. I knew from previous experience of his particular type of difficulty that the short regularly phonetic words were likely to provide the greatest difficulty in learning. No sound by sound building up of words was used during the first term.

The Fernald words learnt were filed in a shoe box word file, alphabetically indexed. In this way an idea of dictionary order was gradually acquired. Keith also entered new words in a small hard backed alphabetically indexed address book, which he could carry about with him in his pocket and refer to at

any time.

In each lesson a short five-minute word test was given to train recall, the emphasis being on writing words. All words taught were listed to taught were listed by me, and after a word had been written correctly on three consecutive occasions it was removed from the testing list, and generally could be considered 'fixed'. As ticks mounted up success was visible to the child.

Things taught during the first term (three months)

- 1. Marion Richardson writing patterns to loosen up hand control and help Fernald tracing. Joined-up writing was practised at home. Keith was keen to write as an adult.
- 2. Blending. To practise blending two sounds the 'Stott Portholes' and home-made two letter cards were used, and two letter words were read from the blackboard. The card games Junior Phonic Rummy and Phonic Rummy, Box A, were used to train blending of three and four letter words. In practically every lesson ten minutes was spent on this. All the time Keith was learning how to attack a short phonetic word on his own, a skill he was entirely lacking. The competitive element of the game made it enjoyable. These packs contained only words with the short vowel sounds in them, and no sounding out letter by letter was permitted. The aim was instant blending, though this process was slow at first. To close on a third sound presented considerable difficulty to Keith.
- 3. Rhyming. As Keith could not hear rhyme he had to learn rhyme by seeing the same visual unit in words. After I taught him 'bike', I rubbed out the first letter and asked him to make it into 'like'. (He could not produce a rhyming word himself.) I also wanted him to recognize the pattern '-ike' as a whole unit. During the term I taught him to recognize these large patterns, '-ike', '-ake', '-ook', '-ank', '-ink', '-ay', '-all', '-end', 'er', 'old', 'ice'. At the end of it he could write the thirty words he had been specifically taught, but was still unable to generalize. He made large illustrations as learning aids when possible, e.g. 'Pink ink',
- 'All balls', 'Frank in a tank', etc. 4. The basic vowels were assimilated from Junior Phonic Rummy with their picture associations 'a' in cat, 'e' in bed, 'i' in fish, 'o' in pot, 'u' in duck. They were not worked on
- 5. When writing Keith was encouraged to vocalize, articu-

lating clearly, saying long words in syllables. By being aware of his speech as a guide he was less likely to omit consonants. It also prevented 'is' being written 'si' and 'was' as 'saw'.

Fig. 45.1.

I play football. It is a game for boys. I play left back. I have to stop the boys from scoring in the goal. I used to play for the school and the street.

- 6. General exchange of conversation was an important part of the lesson. At times Keith would just nod or shake his head and had to be encouraged to reply clearly. Short general knowledge games of 'opposites', 'plurals', 'similes', etc., were played to widen his vocabulary and automatic use of words.
- 7. Spelling rules. These were only introduced as the need arose, but Keith could remember them and seemed pleased to have some concrete facts to grasp. During the first term he learned to drop an 'e' before 'ing', no word ends in 'v', 'i' at the end of a word is usually the letter 'y' and short words end in double 'l'
- 8. Little work was done to counteract reversals, but the constant kinaesthetic feel of a word helped this, along with

awareness of speech.

9. At the end of ten weeks Keith could read all thirty words in his Fernald box when they were muddled up, and could confidently write at least thirty words. Overlearning by means of short tests gave a feeling of confidence as a basic working vocabulary was being built up.

Reading

Only about five to ten minutes of a lesson was spent on reading, and the aim was to read at talking speed, not word by word with finger pointing. Approximately a third or half of a book was read each lesson, and usually one error would be worked on afterwards. Everything written in the topic book was always read back. Sometimes Keith took a book home to read to his little brother.

Readers used during the first term

Beginner books	1 May
Hop on Pop	20 May
Put me in the Zoo	5 June
Are you my Mother?	12 June
Robert the Rose Horse	10 July
Sam and the Firefly	21 July
The Fly went By	•

Later books - further beginner books The Rescue Stories by James Webster Griffin Books by S. M. McCullagh

The World's Great Stories (Oxford University Press)

Apparatus and materials Stott Programmed Kit - Capital Letters **Portholes** Brick Wall

Junior Phonic Rummy Phonic Rummy Fernald Word File Home-made topic book Rapid Reading Tachistoscope Later teaching methods and techniques

The Fernald technique was continued, but tracing became less and the ability to take in a word as a whole at sight was trained. An ever widening vocabulary was built up. More sound patterns were gradually introduced and reinforced where possible by Phonic Rummy blending training. The Stott Jig Saws were used for syllable work and training was given in the recognition of syllable units. To speed Keith's word recognition I inserted home-made cards containing 'his words' in the Rapid Reading Tachistoscope. He often knew the word but was slow saying it because of his poor automatic recall.

Progress

After 6 months

Schonell GWR 6y 4m - 9m progress

Schonell GWSp 6y 8m - 1y progress

7y 5m

Fig. 45.2 shows a sample of free unaided writing in which many words are recognizable.

After 14 months

Neale Accuracy RA 7y 9m

Speed RA 6y 4m

Comprehension RA 7y 10m

Holborn RA 7y 6m

Keith was very happy because his friends had commented that he could read.

Schonell Regular Spelling Test 1B

Keith scored thirty-five out of eighty – at the eight-year level. Initially he could deal with few three letter words, but in this test he managed to work out words like 'membership' and 'congratulate'. It was a slow process, but it gave him a feeling of achievement that he could do this. ITPA Auditory Vocal Sequencing Level – now 6y 3m.

In fourteen months Keith had speeded up considerably in blending ability, writing, word recognition and recall. An ability to generalize from one word to another was developing, and his visual retention improving.

Unfortunately, after this, attendance became irregular; and

after being involved in a series of incidents with a gang Keith was sent to a remand home, and then put on probation. Lack of continuity of lessons hindered progress and in the following six months progress as measured by tests was not evident. After sixteen months he also had a change of remedial teacher at the centre.

Fig. 45.2
Pigeons have two wings and two feet. They are kept in a hut. They lay their eggs in the nest box. In two days the pigeons should have hatched out by then. When the pigeons land on the roof they rest with one leg.

Pigeons
Pigeons have tow weins days halle 345

Remedial education: programmes and progress

Acknowledgement

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References

COTTERELL, G. C. (1969) Check List of Basic Sounds, available from Learning Development Aids, Park Works, Norwich Road, Wisbech, Cambridgeshire, PE13 2AX.

INVALID CHILDREN'S AID ASSOCIATION, 126 Buckingham Palace Road, London SW1, The Assessment and Teaching of Dyslexic

Children.

STOTT, D. H. Programmed Reading Kit, W. & R. Holmes Ltd, 98-100

Holm Street, Glasgow C2.

Junior Phonic Rummy; Phonic Rummy, Boxes A-E. Kenworthy Educational Materials, Buffalo, USA. Available in this country from The University Bookshop, Malet Street, London WC1.

46 Michael, Robert, John and Marc

Gill Cotterell and Margaret Newton

Getting started

Children of average or high intelligence with severe learning difficulties can so easily be left behind on the road to reading because they cannot keep pace with a remedial group. Even the dull children seem able to outpace them. Regular individual tuition is essential for such children in order to get them started. How to go slowly enough can be a problem. In this article, I am outlining the first few lessons given to three nonreaders - a seven-year-old, a nine-year-old and an adult. Having dealt for some years with severe learning cases, I realize that one cannot take for granted that the symbol system of our language is automatically understood. Many illiterate adults have told me that they never understood what the 'letters' were all about, hence it is important to discover exactly where a child breaks down in his thinking. A multi-sensory approach was used with these three cases.

June 1970. Michael was six years ten months old when I was asked to see him in the infant school. I had inquired if there were any non-readers leaving to go to the primary school the following term. He was one of them. Upon testing, he scored a Verbal Quotient of 107 on the English Picture Vocabulary Test 1. He was reported as being very good with his hands and at art, but the letters of the alphabet meant nothing to him. The school used ita but Michael did not understand it. On the Schonell Graded Word Reading Test, he scored a reading age of 5 years 1 month. On the Illinois Test of Psycholinguistic Abilities, Auditory Vocal Sequencing Test, he scored at the 5 year 7 month level, yet to talk to he was obviously quite a bright little boy. Hearing that both his brothers were still in remedial classes at the Secondary School, I suspected that this could well be a case of severe learning difficulty. I intended to

give him help on entry to his primary school.

September 1970. To start with I took Michael with another non-reader, but this did not prove a good idea as the other boy had different learning difficulties and could deal with 'sounds' easily. This caused Michael to be despondent, so instead I gave him individual help once a week for thirty-five minutes. On the Ravens Coloured Matrices he scored 'above the 75th percentile'.

Below is an outline of my sessions with Michael. A week

elapsed between each.

First lesson. I tested his knowledge of alphabetic sounds by giving him Stott's capital letter cards, the green ones first and then the yellow. Although he could match small and capital letters correctly, he did not know the sounds of many. In fact he only knew the sounds a, c, m, o, s. I recorded this on my 'check list of sounds'.

With me he read the Beginner Book, Hop on Pop, as far as page 7. I taught him the word 'up', making him look at it, write it in the air and then on paper. This fixed the symbols for two sounds. He drew himself with his arms up, colouring

the arms red to make the 'u'.

Second lesson. Michael had remembered the word 'up' and could write it. Hereward Visual Discrimination games Michael found 'matching the twins' easy. His visual discrimination was quite good. He then chose to draw a picture of a horse, so I taught him the word 'horse', using the Fernald kinaesthetic method. I gave him a shoe box alphabetically indexed and he kept this as a file for his words, using it with his class teacher as well as me. Whole word kinaesthetic learning helped him.

Third lesson. Stott's Pink Touch Cards 'A' introduced to see if he could identify seven letter sounds, playing with them in various ways. It various ways. He could deal with all satisfactorily except and 'n' and the could deal with all satisfactorily except and 'n' and these sounds he confused. I have observed this particular difficulty before among those with severe auditory difficulties. I took to fixing a wooden 'n' on my nose to form the association by the association between symbol and sound to aid this recall. I talked about the grunting 'n', because I knew that this sound would cause difficulty within words and I wanted him to be aware of it.

Fourth lesson. Stott's Pink Touch Cards 'B' introduced, containing the same sounds as previously, but showing different pictures. 'T' again caused hesitation. I pointed out that his surname began with 'T', and he drew 'Turner's Tiger under the Table' to aid recall.

Stott's Pink Morris Cards played with.

Fifth lesson. Stott's Pink 27s, a test of writing the symbol for the sound at the beginning of the same words that occurred on the Touch Cards. He could do this. The symbols from which he had to choose were at the top of the card, which helped him. To recall symbols on his own out of space would have been much more difficult.

I used Miss Baldwin's book Patterns of Sound Book 1 to give the idea of blending sounds, 'going into' the word, not breaking it up into individual sound units. At the end of the first four pages Michael learnt to write 'Mum and Dad', following his speech as he wrote. This fixed 'd' and 'a' as two

Sixth lesson. Patterns of Sound Book I again. Reread it from the beginning. Michael could still write 'up', 'Mum and Dad'. He continued on to the section about 'Nan', where the 'n' was revised.

Stott 9's Pink Cards were used, matching initial letter to

Seventh lesson. Patterns of Sound Book 1. 'H' and 'f' taught, the latter being thought of as a 'teeth on lip' sound. Michael drew a jeep, so I took the opportunity of working on 'ee' words. He then drew round his feet on a piece of paper, and outlined them in green. Inside them he drew little pictures, named by me, and wrote the word below, using letters to help him if necessary, 'bee, tree, jeep, green, feet, eel, peel, and heel'.

Eighth lesson. Michael read his first book right through to me, Green Eggs and Ham, with me telling him new words as they cropped up. He was very thrilled by this achievement.

Ninth lesson. Neale Reading Test - Reading Age 6 years 10 months. A start had been made with reading and he could confidently write up, Mum, Dad, can, see, jeep, horse, my, book, look, man, van, is, feet, hill, Peter.

The recall of symbol for sound was still very slow, but small activities aided this. Individual help was continued, the class teacher working with me.

Robert

March 1971. Robert moved into a school in my area when he was nine years two months, a complete non-reader. On the English Picture Vocabulary Test, his Verbal Quotient was 101, and on Ravens Standard Progressive Matrices his intelligence quotient equivalent was 95. His father is a long-distance lorry driver and his mother tells me that she cannot read very well even now. Robert had made no headway with reading in a remedial group previously and was thought to be a disturbed child. He had already had three changes of school in a short while.

I called at school to see Robert and upon testing him found he had great difficulty in recalling sound for symbol and symbol for sound. He wanted to succeed with his reading but he just did not know how. I felt he had a severe learning difficulty and being of at least average intelligence he was already reacting negatively to failure. On further testing, I found he had an auditory memory at the seven-year level, so I knew it was likely that he would be able to deal with a systematic phonic approach. His weakness was in the area of visual recall of words.

April 1971. I arranged to give Robert forty minutes of individual help weekly as I felt he must not be allowed to fail any longer. At school he was reported as being weepy and rather difficult, but by the end of the term, he thought it was the best school he had ever been at, and he was reading at the 6 year 10 month level on the Neale Reading Test. This was very pleasing as he had never scored previously.

First lesson. Stott capital letters (green only). Confused 'm' and 'n', and did not know e, u, w, q, v.

Patterns of Sound Book 1. This book ensures instant success for the failing reader and was different from anything previously encountered. He learnt to write Mum, Dad, Nan, up, pup. I especially stressed the connection between the sound made

by the lips and the written symbol, e.g. m - mouth, n - nose.

At the end of the lesson, Robert said he never remembered

things! Second lesson. Robert was surprised to find that he had remembered each of the five words he was taught on the previous occasion, although a whole week had elapsed since my visit. He was able to write each correctly. Learnt 'h' and 'f' from Miss Baldwin's book. Played Stott 'Portholes' to teach two blends, a consonant with a vowel. He enjoyed this and his auditory discrimination of vowels was good.

He drew a tank and wrote, 'This is the greatest tank in the world'. He used the Edith Norrie Letter case for building each word. I helped where necessary to guide his thinking. He concentrated well. It was important for the lesson to contain a variety of activities in order to maintain interest and to cater for his weak span of concentration.

Third lesson. He read Green Eggs and Ham as far as page 33. He learnt 'eat' and 'would', and entered each in his new alphabetically indexed note-book. This is small enough to fit in his pocket, and has a hard back so that it can be a constant tool during his school days as long as he needs the prop. Played Stott 'Portholes' again, speeding up now.

He drew 'A man from Mars'.

Fourth lesson. Finished reading Green Eggs and Ham, and could remember the new words he had learnt. Each week I retested words taught until they had been correct on three consecutive occasions, and then they were removed from the testing list. As he could blend two sounds easily I introduced Robert to Junior Phonic Rummy. He loved this game and it provided him with plenty of blending practice. He had difficulty in closing on a third sound.

Fifth lesson. Robert played Junior Phonic Rummy twice, winning both times. The competitive element always makes

He read Racing to Read Book 1. He worked well and with this game popular. interest. He was really thrilled to be reading something, how-

Sixth lesson. Read Ten Apples up on Top, another Beginner

Book. He went right through the book and was delighted at his achievement.

Junior Phonic Rummy again. He kept forgetting the sound of 'h'. I told him to 'blow hot air on his hand'. He drew pictures of objects beginning with 'V' to establish the sound for the symbol.

Seventh lesson. Robert's class teacher came in to observe what Robert was learning to do so that he could work with me to help Robert.

I took his second name Ricky, and using the Edith Norrie Letters he built this, then 'tricky' and 'sticky'. He drew himself in running shorts and wrote 'Ricky was tricky to beat'. 'Ricky eats sticky buns.' He gained the idea of rhyme by doing this, changing the initial letters of a word. He wrote the words rhyming with Ricky in blue felt tip pens and the rest in pencil.

He read the 'ck' page in Miss Baldwin's Patterns of Sound Book 2 and then wrote 'Jack' and 'Dick' at the top of two columns. He wrote words rhyming with each underneath and his class teacher helped him add to the list during the week. As well as teaching the unit 'ck', the rule about 'y' being used for the 'i' sound at the end of a word had been naturally introduced.

Junior Phonic Rummy, pack two, but slightly more difficult consonant digraphs introduced.

Eighth lesson. Read half of Put me in the Zoo and asked to play Phonic Rummy again. This we did. Robert is getting the idea of blending quickly now. He is altogether a much happier child and although he cannot compete with the others in the classroom he is less troublesome and knows that he is gradually improving his reading skill.

John - a non-reading adult

John is a forty-five-year-old carpenter, married, with a son of eleven who has great difficulty with reading and writing. His father was illiterate and John has struggled along, hiding the fact that he cannot read and write from everybody. He manages to 'get by' in his job with little written work, but he has always been embarrassed by his difficulty, and covers up as much as possible. He revealed to his son's remedial teacher

one day that he could not really read either, and as a result of this was offered help in my adult evening class. As John was considerably behind the group, he had individual help for forty-five minutes weekly. He was very keen to be helped.

On the Neale Reading Test he scored at the 6 year 6 month level and he spelt at the 6 year 10 month level. He was unsure of basic sounds and could only deal with three letter words

confidently.

Step by step I built up his knowledge of sound units and trained him to blend and sequence sounds. Most of the time he wrote words, following his speech, and using the Edith Norrie Letter Case to aid symbol recall when necessary.

First lesson. I built 'all' with the letters and asked John to build 'fall'. He then wrote 'fall', then 'falling', to see if he could add 'ing', then 'tall', to see if he could change the initial sound, then 'taller, tallest, wall, ball and small' (to see if he could deal with double consonants). By following his speech he was able to do this

Using the Edith Norrie letters he made up a sentence about something he had done during the day. 'I dug a trench.' I guided his thinking and then covered the sentence and he wrote it from memory. I gave him an alphabetically indexed notebook in which to enter words he might need. He entered 'trench'

He played Junior Phonic Rummy to speed blending of

short words containing the basic vowels.

Second lesson. We played with the second pack of Junior Phonic Rummy, reading slightly harder words, containing double consonant digraphs. 'In' was worked on as a unit. Words were listed ending in this. Then he wrote 'ink' and 'ank' words.

Spelling rule taught: 'Al' only has one 'l' when it is joined to another word. This was entered in his notebook. In every lesson, I repeated words taught in previous lessons, calling them out for John to write. He seldom got one wrong. I listed these on the back of my check list.

At the end of the lesson, John wrote, 'Today it has been

raining hard', and 'I am a carpenter'.

Third lesson. Fourteen out of the fifteen words tested were

correct. 'Ay' introduced. Words written down containing new beginnings and endings, cl, fr, sw, pl, pr, -ed. It was mentioned that no word ends in a 'v'. Read *The Prisoner*, Longman's Structural Reader Stage One. Played Phonic Rummy 'Box A', using further words containing basic vowels. Closing on the third sound was still a difficulty.

Fourth lesson. Introduced 'oo'. Words containing this were listed by John as I called them out, gradually getting more difficult, phonetically speaking. 'Qu' rule taught and useful words beginning with it were entered in his notebook. Read Detectives from Scotland Yard Stage One, and John took the book home to finish it.

Fifth lesson. 'Wor' rule introduced because the word woodworm cropped up. 'Ar' introduced, especially art, ark, arm, arch. Played Phonic Rummy 'B', containing words with 'ay', 'ai', 'ee', and 'ca' for reinforcement. Read Worth a Fortune, still Stage One Longman series.

Sixth lesson. Worked on 'ow' as in low, bringing in many new double consonants. 'Est' and '-ly' introduced. Read Hamad the Driver, Stage Two, and borrowed it. John is gaining in confidence and beginning to recognize sound units.

Played Phonic Rummy 'A' (green pack), which is the most difficult of all those containing the basic vowels.

Seventh lesson. 'Ice', 'ace' - bringing in the soft 'c', which may help as a tool for reading. He wrote about a brace and its uses, using Edith Norrie letters to help build words when necessary. Eighth lesson. Introduced 'ea' as in 'tea', These words are hard to recall for a weak visualizer. The words were woven into simple sentences to support each other. Lessons continued gradually introducing further sound units and useful rules as they became necessary. After sixteen lessons, I retested his reading and he had reached the 8 year 6 month level. He said he could pick odd words out of the newspaper as he understood what words were about now. Before it was a mass of meaningless hieroglyphics to him.

Marc

Marc was a little boy of six, referred to us by a perceptive infant head teacher, after he had been attending school for less

than one term. His behaviour was odd and bizarre; he was completely unaware of his surroundings and made no attempt to adjust to any situation. He would be brought into the hall for assembly; the children would sit but Marc would remain standing; he would make no resistance when helped to sit. but he would then remain seated when everyone else had gone. One morning he was left (for observation purposes) and at playtime was still sitting crosslegged alone in the middle of the hall. If left alone, he would remain mutely in his dreamlike state, allowing himself to be moved from place to place, helped into his coat or shown into the playground. If pressure were put upon him, however, to conform to any activity, he would utter harsh and animal-like cries, would scream and throw himself on the floor. The parents assured the head that at home he talked, played and displayed much intellectual curiosity. We discovered that Marc's parents were both highly cultured and educated expatriates from a mid-European country and that father, a professional man, was a political refugee. When Marc was eighteen months old, a baby sister was born and just before this MGM came over to be with them. Marc formed a very loving relationship with his Grandma. She returned to Europe after six months and soon afterwards Marc, whose development had seemed normal until now playing, talking, learning nursery rhymes, exploring the world around him, seemed to change. He became quiet and uncommunicative, would not pass water, retained faeces, became extremely ill with bladder infection and began to have excessively violent temper-tantrums. These persisted until school age and he would break furniture and deface the walls if not restrained. Physically he was a beautiful child, as often seems the case with autistic-type children, with sculptured features, fine skin and large brown eyes.

The following are notes made while treatment was taking place:

June 17. Mother acted as 'mediator' during this first session and interpreted instructions. Marc traced and coloured happily with mother close beside him. Relaxed, laughing, purposeful. Liked the big free-art crayons – especially the purple; showed pleasure when given a box of crayons to take

home - but only to mother. Hostile reaction to me, made wild grunts and 'jungle' noises at any approach - physical withdrawal and violent shrug. Using mother again as 'mediator', various activities presented, e.g. Cuissenaire rods, scales, Chinese doll - slight incline of head towards these, but then rejection, followed by a blank stare. Gave mother pictures, tracing paper and suggested an assignment of work at home. June 24. As no apparent progress since therapy session - i.e. no separation - decided to make enforced separation. Mother to bring Marc into room then leave, risking the consequences. Mother, on being reassured, went, leaving basket on chair. When realization dawned, very violent reaction. I held him firmly, making firm but kindly assurances that mother was waiting for him downstairs - he would see her shortly. He struggled and fought - I half carried him to my chair and nursed him on my knee. He strove to escape crying wildly. Mother came in at this point; I assured her again that all would be well if she just left us a little longer - and she returned downstairs. After fifteen minutes he tired, stopped struggling and I talked to him; presented the Speller Quiz (which has an eye-catching whirring action) and he watched it warily, quietly; eventually climbed off my knee and watched the gardener through the window. When I stood by him, talking and naming the objects in the garden, he began to slap me very hard on both arms. I held them out for him, saying it really did not matter as I wanted to help him. Eventually he quietened down again. I smiled at him, hugged him and found some books to take home. Indicating it was time to go I asked him to carry Mummy's basket. Blank stare of no understanding. Led him to the chair, picked up basket, closed hand around it, held his other hand and we went quietly down the stairs to Mummy.

June 27. Mother brought him, approached me, half admonishing and said Marc had asked her to tell me something – that he was too big to sit on my knee; he did not want to be nursed now; he did not like it, he was too old. I agreed immediately, it again. Room prepared – track racing cars, guns, balloons, conductors' set, etc. – no difficulty in coming up with me

only momentary attention on these however - said mother could go downstairs now - she left her basket on chair - no protest - mother gave me the tracings Marc had completed and went. Marc ranged round the room touching things. I showed him the stapler, saying we were going to make his pages into a book - gave a wild cry when I first stapled his pages - realized it was 'safe' and was immediately interested. Wished to investigate inner workings of stapler - appeared to have insight into process - pleased with books; went to corner desk where he had previously worked and gleefully held up purple crayon; but would not colour, or involve in any work at all. I presented balloons, we had a game, blowing them up and letting them down, slowly - Marc highly delighted, shouring with glee; liked the feel as balloon went down and accompanying noise. Indicating time to go I asked him to carry mother's basket. This time he went to chair, picked it up and carried it down.

July 1. Came immediately upstairs when I appeared; would not carry homework when mother suggested it - prepared and

happy to leave mother downstairs.

July 4. Separated easily from mother. Searched room with his eyes. Quickly went through all previous activities, i.e. climbing through window, investigating pipes, Cuissenaire rods, scales, Chinese doll, stapler. Opened pot of glue; painted this at random on sheets of paper on floor (produced these hurriedly or glue would have been directly on floor!). Opened blue and red paint; dipped in finger deeply – finger painted in glue, just wild and messy, no attempt at pattern. Made for cloakroom; washed hands competently. Climbed on wash basin to watch water run outside. Investigated lavatory, flushed, worked light switches, all hurriedly. Returned to room and we made covers for his tracings and a drawing book. Took these down to mother.

July 11. Separated easily. He had written his name on books, but reluctantly, said mother. On entering room once again hurried through sequence of previous activities. Showed him the new plasticine. He emptied the boxes and happily arranged the fourteen blocks on boards. I talked while he did this, naming the colours, etc. I matched the purple with the purple

cancarron. programmes and progress

crayon and he quickly matched all the other colours. He liked the feel and smell of the plasticine. I drew up a chair by me, showed him how the little book shelf worked at my desk and produced the Green Book (Boyce). 'I was going to read him a story,' I announced, 'and he could watch and listen.' We sat closely together as I read and part-dramatized the stories. He was very quiet and attentive, shouting with glee at some of the pictures. We took the book down to mother, he ran to her, gabbled quickly in Serbian. Mother translated, 'He says he has read three stories'.

July 17. Father brought Marc, he was friendly and pleased reported on two developments: (i) Marc very excited about his book, rushed to tell father about this immediately he returned from work; (ii) Marc had used the toilet for bowel motion for the first time in his life - this at the clinic - father very delighted. I asked him to fetch the plasticine from the cupboard, which he did immediately (complete understanding of all my instructions) and arranged it in colours, as previously. I then announced that today we were having the blue book; he found the little shelf at once, and listened attentively while I read four stories, shouting with glee at the picture of the fox, we sat closely together and once he rubbed his cheek along my hair and forehead.

July 24. Mischievous play with Chinese doll – balancing tops on wrong bottoms, etc., laughing with glee. Sat close to me while I read stories from the purple book (he had chosen this one from the shelf) - anticipated my directions to take it down to father - gave father the little blue and green books for Marc to read at home, while he could read the purple book at storytime. Father delighted to report that Marc now using the

toilet at home quite normally.

September/October. Marc has evolved his own 'pattern' for therapy sessions. During the last eight visits he has painted a single colour picture covering the large drawing paper meticulously with the chosen colour of the day. He has now worked his way through all the available colours. He has accepted my suggestions for titles, for example snow, grass, soil, sea, etc. He has appeared to derive much satisfaction from this activity; shown them to Mother with a very animated

verbal description (in Serbo-Croat!) and taken them home. November 11. He still refused to involve in classroom activity, although his teacher is convinced that he understands most of what she says. He blushed slightly and responded to my smile when I went to sit by him. I took the Russian doll from my case, to serve as a familiar link between us. The other children were friendly and Marc did not appear to resent their interest as they crowded round his desk to see the doll. He did seem to be aware of them however. During the story his eyes were 'warm' and interested not dull and opaque as last year. His teacher is hoping that we shall be able to make a link from 'safety' of home - to clinic to school, and eventually release Marc's energies to involve in a meaningful way in school work. She is now convinced that it was a good plan to put him in his present class. Mother, teacher and I feel that he is absorbing something every day and this is his appropriate age group, etc. Teacher hoped that I would go again in the morning activity period.

I discussed future action afterwards, with his teacher. She is very experienced and able. It was suggested that it might be a good time now to give Marc a short period of individual attention each morning - to work through an assignment with him in a purposeful and very firm manner: to make this his daily habit.

Meanwhile, during the clinic sessions, Marc has reached a Quieter, more conforming stage. After he had painted through all the single colours, he managed to do two pictorial efforts a garden and a bonfire – but confided to mother that he had lost some interest in painting and was now going to do 'the rods' (Cuissenaire). The pattern of the session now began with Marc Working quietly and purposefully at a desk – making meaningful geometrical patterns with the rods. He was absorbed in this activity for twenty to thirty minutes for the last five sessions of toof term. Number patterns discussed and the ten and twenty bonds' written in his work book. Reading homework continued. Having finished the Boyce fill hooks, we proceeded to matching

to matching word-picture games, recognition games (fishing, written in a new word book help from These were written in a new word being to the with obvious help to These were completed at home

mother, father or grandmother – but mother assured me how he enjoyed the games with the magnet and wanted them several times. During the last week of term Marc accepted other children in the room during play therapy, was not disturbed by their presence and on occasions seemed to be involving in the fun of others.

March 23. At the beginning of term we continued to 'build-in' language and reading experience based mainly on Boyce word-picture-letter activities. The latter half of the session was preparation for the work to be done at home - standing at my desk, close by me, watching and listening. By half-term I felt that Marc was ready to take a more active part in the reading situation. I started, therefore, by the 'direct' teaching method - presenting written commands, interpreting them and expecting Marc to interpret also, e.g. 'Look at the doll', 'See the window', 'Find the door'. The commands were stapled together, put in covers and given to Marc for homework to copy and illustrate. We made four of these 'command' books, including in the context objects and people to be found at home, each book a size bigger than the last, with the cover to be decorated by Marc. The fifth book began letter recognition. Marc became really involved in this and by the end of term had completed three books. The teaching was again done in a very close and intimate way; I repeated the words and letters several times, making reference to other objects, etc. Marc began to mouth the words himself as I read them. At last I thought the moment had arrived when Marc could voice the sounds to me. Initial resistance, but as I quietly, firmly insisted and waited, he eventually whispered the words and letters. Next term we go on from there actually reading the words and sentences, until he is ready to begin a formal reading scheme. Concomitant with these prereading activities, Marc selected a book to take home each session (Five Friends, Janet and John Story Books). I have read and dramatized the story first, while Marc has stood close by me, always absorbed in the adventures. Throughout the term, parents have cooperated very well in all these home assignments, especially Mother.

During the summer term, we have continued with our

efforts to help Marc to make meaningful involvement in language and reading. He continues to find it difficult to 'voice' the English sounds of words to me. The barrier of resistance against speaking English built up in earlier days seemed impenetrable and ways had to be found to make 'loss of face' in this situation bearable to this proud, shy boy, very much identifying with his father. It was decided, therefore, that we should share the learning situation. Marc was to teach me Serbo-Croat while I taught him English. The breakthrough came one morning when he was watching the gardener through the window. I said how difficult it must be for him to be expected to say everything in English. Would he teach me his language and we could chat together; a long pause then suddenly he pointed to the garden and said in loud firm tones 'Velika trava, molo trava' (Big grass, little grass), a very moving experience really, as it was the first normal communication he had made with me.

The great encouraging discovery was to find that Marc could, in fact, write down the Serbo-Croat words, building phonetically when necessary. He still pronounces English begrudgingly, tight-lipped and often in the deliberate manner of a deaf child, but progress has been made. Father reports that he is much more aware of life and people around him; that he was overheard giving his sister a full account of his day in school, in *English* and that he doesn't mind going to school, but will not, as yet, show what he knows! With extremely good cooperation from the infant school head and junior head, Marc has been placed in his correct grouping in the junior school next term. The junior head is very willing to cooperate with the clinic and would like Marc to continue his treatment sessions here, for the time being at least.

This has been Marc's first term in the junior school, he has been fortunate in having a man-teacher who has shown great interest and insight and who has provided a safe but stimulating environment in which Marc has been able to learn and develop. He has begun to take part in classroom activities; to take his turn as monitor, to paint, make models (these activities he did alone at first in the little store-room adjoining the classroom, but is now able to work normally at his desk).

During the school visits, it has been most encouraging to observe his new confidence and involvement - visits to the school library, changing and choosing his books, drawing and wanting and making work books. At the clinic emphasis has been laid on reading and number attainments, with the school taking part in the same programme of work.

He will talk to me in a mixture of English and Serbo-Croat, still relying however on my intentive understanding of his needs. The same applies in school, where he was at last persuaded, in October, to say 'thank you' to his teacher (big breakthrough). He will still regress in any situation of supposed stress - e.g. all the excitement of Christmas, has torn up his card, made the odd faces and noises, etc., but at home is most mature and responsible in many ways - still showing, however, his obsessive tendencies if any possession is lost or broken (e.g. mother must have a roll of sellotape ready always, to repair a broken crayon, etc; this adjustment to reality is a field in which we can perhaps help more next term by providing more opportunities and subsequent adaptation). He has attended the clinic alone, however, since November, walking the distance from home. Overall an impressive improvement.

In this type of language barrier, first teaching seems even more crucial. If the insight and cooperation of head teacher and class teachers had not made special help available, the prognosis for effective adjustment by later remedial help does not seem at all a hopeful one. One sometimes wonders if experimental psychologists reputedly investigating this condition have in fact ever met the kind of autistic child with whom I am familiar. To me their efforts to discover if a 'stuff and wire mother' is preferred to a real mother seem like the extremes of black-comedy, or the writings of an Ionesco. The desperate need for flesh and blood contact is so movingly revealed when one gains the trust of such a child: the responses to any physical contact and in Marc's case the urgent way in which he held his forehead to mine when engaged in joint activity.

It seems impossible to lay down hard and fast rules to evolve a system of treatment yet. In many cases where emotional barriers appear insurmountable, one works empirically, being ready with all one's training, experience and humanity to seize any handhold, foothold or fingerhold with which to help them to accept help.

References

BALDWIN, G. Patterns of Sound, Books 1 to 4. Chartwell Press, distributed by Heinemann.

Beginner Books, Collins & Harvill Press.

COTTERELL, G. C. (1969) Check List of Basic Sounds. Available from Learning Development Aids, Park Works, Norwich Road, Wisbech, Cambridgeshire, PE13 2AX.

ICAA, The Assessment and Teaching of Dyslexic Children. Available from the General Secretary, 126 Buckingham Palace Road, London, SW1;

includes chapters on Fernald and Edith Norrie techniques.

Juntor Phonic Rummy; Phonic Rummy A-E. Kenworthy Educational

Materials.

Longman Structural Readers, Longman.

STOTT, D. H. Programmed Reading Kit. W. & R. Holmes.

NARE: the first ten years

Roy Bushell

The growth of the National Association for Remedial Education over the past ten years has followed parallel lines with the expansion of 'remedial education' in this country. During the 1950s the story of remedial work was a very hazy one with a few areas of the country attempting to provide services which were designed to help particular children who were experiencing difficulties in the school situation. The strongest area for this thinking was in the Midlands due mainly to the work of Professor F. Schonell and the Child Study Centre at Sellywick House in Birmingham. The thinking behind their work was geared closely to Schonell's 'retarded' child who for various reasons was failing to fulfil his apparent potential. Consequently, the children referred for remedial help were always in the higher level of intelligence and by diagnosing their reason for failure, which was usually an emotional one, prescriptive programmes emerged which were designed to remedy the specific points of breakdown. At this time few schools had remedial teachers and the one-year supplementary and advanced courses were in their infancy - in fact by the end of the 1950s the courses held at London and Birmingham University were pioneers in training teachers to specialize in this field. It was interesting to see that the one-year course at London led to the formation of the Guild of Teachers of Backward Children, which in recent years has veered away from the less able child in the ordinary school into the area of the educationally subnormal - severe. Scattered round the country were a few remedial centres, each one operating in isolation and each differing in its approach to the work. Local education authorities were beginning to realize that many problems existed in the ordinary schools and were beginning to consider how they could best help. This was normally attempted by the early ideas concerning remedial services (Staffordshire starting in 1955) or by the provision of peripatetic remedial teachers as set up in Worcester, Wolverhampton, Birmingham and West Bromwich, again very much to the fore in the Midland areas. The next move was for some of the teachers and advisers concerned to get together with a view to correlating ideas and approaches and to further the provision of teachers, the setting up of more courses and the extension of resources which had been found to be effective with the slow learner in the ordinary school.

Early in 1962 a meeting was held in Birmingham which was attended by representatives from eight authorities in the Midland area. The result of this meeting was a questionnaire to all authorities in the country with an enquiry as to the provisions which they were making and any plans which they had for the future. In addition a Midland Federation was organized and plans were made to hold a conference in 1963 from which it was hoped that a national body would emerge. This conference was held in Smethwick and was extremely successful. The feeling of the delegates was plain – a national organization was needed to help teachers dealing with remedial work in centres, peripatetic services and within the normal schools. Thus began the National Association for Remedial Education under the Presidency of Jack Mount and with Mrs Joyce Knowles as the first Secretary.

The task of this new Association was a broad one. The idea of training teachers with the necessary skills and techniques to assist children with learning difficulties – whether they be caused by neurological reasons, low cultural backgrounds, low innate ability or by a combination of all three – was new. However, the country was ready for this and the interest shown was proved by the steady growth of members and also the increase in supplementary and advanced courses attached to universities and colleges of education. Most authorities began to extend their services and the realization of the need during the last ten years has been assisted by interest at the DES and culminating in the Schools Council project on the Slow Learner, which is under the control of W. Brennan, an ex-President of NARE.

Certain patterns have emerged within the Association which appear to have contributed to its successful growth.

There has been a great willingness on the part of colleagues throughout the country to undertake voluntary work on the Executive Committee and as officers of the Association. At all times NARE has been able to call upon the services of officers etc., who although extremely busy with their own work, have been willing to serve on working parties and sub-committees. The stages of development had been closely connected with the Annual Conference, the journal, the Newsletter, and with growth of branches up and down the country. The Annual Conference, which has been held at various centres throughout the country, has grown from humble beginnings at Buxton but very enjoyable ones in their intimacy! - to the 1973 conference at the University of Exeter which was attended by almost 300 delegates and the final numbers were limited by accommodation. These conferences are now nationally known and are attended by teachers and professional colleagues from all over the United Kingdom. They are the soundings where we are able to reflect on our philosophy of education as well as planning for future development. The popularity of the annual meeting has led to the setting up of Regional Conferences which are now developing in various areas and which are epitomized by the Midland Federation Easter Conference which has now been held for three years and has set a pattern for the future.

Much of the success of the Association must be attributed to our highly successful journal, Remedial Education. Under the control of Paul Widlake this has gone from strength to strength and despite various problems with publishers etc., is now established as one of the finest education journals in the country. It is certainly accepted as the voice of remedial work in the country. Running at the same time as the journal has been the development of the Newsletter under the editorship of Maurice Peterson and Michael Hinson. This has been closely connected with the growth of the remedial group throughout the country – the secretaries of these associations are able to report on their activities as well as allowing for publicity for recent moves in the remedial field.

As can be imagined the growth of the Association from fewer than ten in 1962 to more than 2,000 members in 1973

has led to the setting up of various subcommittees designed to explore different aspects of remedial work. These have included work on primary, secondary and adult illiteracy, training of teachers, evidence to the Bullock Enquiry, status of remedial teachers and recently the Publications subcommittee. Of these it is worth considering the results of the Adult Illiteracy Committee, which has illuminated the needs of this group and which has led to the improvement of the services offered, two national conferences, a published pamphlet and a regular newsletter. Without this support, the plight of the adult illiterate would still be largely unexplored. Similar success has been found with the other subcommittees and the most recent one formed for the purpose of providing useful remedial publications has already proved that this is again fulfilling a need and the sales of the A-Z of Reading and Reading Games are most encouraging.

The NARE has held membership of the National Joint Council for Handicapped Children from its inception in 1965 and one of its present Executive Committee has held office as National President and is at present Secretary of this Council, which is representative of all professional educational bodies dealing with the problems of handicapped children. Through this body and from its own Executive, the NARE is able to voice opinions on national issues and therefore have an influence on policy making at the highest level. This influence was made clear by the publication in 1970 of the Report of the Working Party on the Organization of Remedial Education. This was circulated widely throughout the whole country and for the first time teachers in this field had an official statement of the type of future provision for remedial work which could be the pattern for extensions which could only lead to broad improvements in the type of specialized education for children with learning problems. Remedial education as defined in this report (see below) is required by more than 700,000 pupils in our ordinary schools based on a conservative estimate of 10 per cent of the school population. One can only hope that the Schools Council project on the slow learner, the updating of the research carried out by Olive Sampson, and the changes offered under the new educational authorities in

Remedial education: programmes and progress

1974 will lead to the fulfilling of the basic requirement for remedial education as laid down by the National Association in the ten years since 1963.

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